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RURAL TASTE.

"RING OUT THE OLD, RING IN THE NEW,
RING OUT THE FALSE, RING IN THE TRUE."

—Tennyson.

RURAL TASTE

In Western Towns and Country Districts.

IN ITS

RELATION TO THE PRINCIPLES OF THE ART

OF

LANDSCAPE GARDENING.

BY

MAXIMILIAN G. KERN.



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P R E F A C E.

The manuscript of this unassuming volume has been submitted to me not only for my opinion as to its rational connection with matters of education, but also for such emendations and suggestions as might be deemed necessary to the composition of one who is not a native of this country, and whose reading and thinking has been largely in foreign tongues.

Although previously but slightly acquainted with the theory of Landscape Gardening, I have become more and more interested in the development of the subject, and have laid the book down with a far clearer insight into the matter and a much higher appreciation of its real merits than I had thought possible of attainment without close and protracted study.

The work is written, not as are most books on similar subjects, by mere theorists, or for the sole use of the wealthy classes, who most largely patronize this art, and have unlimited means at their disposal for carrying into practical operation the suggestions contained therein; but the writer is one of the few thoroughly educated, scientific Landscape Artists whose names are known in the history of the dissemination of this art, as expressed chiefly in the creation of the principal ornamental grounds of our country, His field of

operations has been in the west, and the leading public parks in the metropolis of our State owe their artistic development mainly to his intelligent labors.

His efforts to remove the subject from a purely professional basis and to place it on educational grounds, should therefore be considered doubly valuable, inasmuch as artistic ideas in this as in all other branches of education can be popularized only through educational means. Most heartily, therefore, do I commend the book to the teachers of the country, under whose guidance the thoughts of the youth committed to their instruction may be awakened to the consideration of a subject which, properly understood, would create a revolution in the general appearance of our rural homes, the grounds surrounding our schools and colleges, and especially of the cemeteries of our land, with which our most sacred feelings are so closely associated.

A. F. FLEET,

Professor of Greek.

University of Missouri.

PART FIRST.

MATTERS OF TASTE.



INTRODUCTORY.

The subject discussed in the following pages is one of practical Art, available to all who wish to plan and to conduct rural improvements, embracing the design of grounds and the planting of trees, with a view to pictorial beauty and attractiveness to the public mind. The essence of the subject may appropriately be presented to the reader, by pointing him to Nature, the source from which Art, in its widest sense, has ever drawn its inspiration. The endless volume of scenery written by the hand of creative omnipotence, reveals to the reflecting mind the inmost thought of the Creator, infinite beauty and clearness, expressed throughout the entire realm of scenic nature. Well may this evidence of the thoughts of God join in with the anthems of praise proclaimed by the heavens and the starry firmament above.

These attributes of scenic nature are the basis from which man has derived his fundamental conceptions of the beautiful which have developed into the empire of Art and Culture, crowning the age in which we live : the leading pillar of the civilization of the race. Art claims to be an inspiration from on high. In order to deserve this exalted name, it must be firmly founded on the manifestations of the thoughts of God found in his handiwork, the charming scenery of nature which surrounds us on all sides. We may reverently believe that these ideas of creative wisdom were materialized in nature not merely for the abstract glory of the Creator himself, much less for the sole benefit of a carnal and greedy race of human beings, destined to populate this globe. They were to be the foundation on which the crowning triumph of creation, intellectual nature was to be reared, the central sun to illuminate the pathway of human progression. Its history verifies fully this assertion. The beauty of material nature has ever been the faithful instructor of the human mind. In the unknown past, darkened by mental depravity and ignorance, the charms of Nature were the cloud of light, kindly

drawing the bewildered mind towards its origin and destiny, the Creator. In more enlightened ages they were the pillar of fire leading the van of civilization, on the summit of which we often musingly gaze through the long vista of time, forgetful of the God-sent motor, of the culture in which we rejoice and pride ourselves.

The inspired writer of Genesis expresses very significantly the true object for which the different components of nature had been created. In mystic language he tells us of the ideal home of man, as a garden, a scene of infinite beauty and attraction to the mind, in which its dormant faculties were to be developed, amidst the charms of which its tastes and aspirations were to be formed. How different is this scriptural version from the all-powerful, all-devouring materialism of our day! Can a kind voice to mankind, though allegorical it may be, be more eloquent than this one heard from the "garden eastward in Eden"? Could words, relating an occurrence real or ideal, foreshadow more clearly the fundamental principle of education in the intellectual culture of mankind? Are we really to wonder that a mysterious chord of sympathy vibrates through every human heart, binding it indissolubly to the charms of nature? Are we to wonder that this union shall be perpetual, not be severed at the end of our existence on this present plane, on which we fondly anticipate meeting brighter scenes of nature in the unknown future "beyond the river"? Can it be possible that all these impulses of the soul, so gracefully engrafted on the religious conceptions of mankind, should only be wild phantasy? Then the poetry of the Christian era would have missed its mark and object sadly indeed.

No one denies the fact that the grade of mental culture possessed by the individual conditions in large measure his share of enjoyment, realized in communion with nature, and consequently his need of happiness and contentedness, independent of surrounding circumstances. We are therefore forced to recognize the imperative necessity of an enlightened system of mental training, calculated not merely to develop the plane of higher æsthetic culture, on which fortune and accident place at best only the comparatively few, but

chosen with an honest view to the advancement and refinement of the masses, a school in which the mind is trained and developed in harmony with the educating influences of nature herself. The benefits resulting from the recognition of their blessed mission in popular instruction, would be most directly felt by those great masses of the people engaged in the culture of the soil, and consequently in constant communication with nature, whose inward charms and lessons are lost to the greater numbers, solely for the reason that educators have neglected to accord to them their due importance and dignity in the process of mental training.

There was a time when Art and Science stood proudly on a pedestal entirely of their own choosing and construction, and expected to be entitled to the universal admiration of the masses. The barrier separating the thinker and the worker has vanished before the light illuminating our day. These motors of culture have gracefully descended and have fraternized with the people, losing none of their wonted dignity by the change. The light of Science has stripped from labor the brutalizing yoke of drudgery, has made it honorable and more remunerative than before. The products of Art have literally flooded the civilized countries until they decorate all walks of life with grace and beauty.

There is a modest branch of Art, by the wayside as it were, which decorates the home grounds of the people, embellishes wide-spread neighborhoods, creates the pleasure grounds of the large cities for the benefit of the crowded masses, and converts the dreaded graveyard into a scene of sylvan beauty and attraction to the living. Its products wherever found, are freely enjoyed by all, they are not owned solely by one, but are a boon of pleasure to all alike. Its principles are the same as those of the art of painting, universally considered the climax of all fine Art. The latter paints the picture, the former designs the ground and plants on it the sylvan features in whose grateful shade posterity will rejoice. Being forced to dig the ground and plant therein the seeds of future charms, it is called "gardening," a name which causes erroneous impressions in many minds, and tempts quite often the real material gardener to consider himself also a true landscape

gardener. This is one of the many difficulties which impede the progress of so useful and practical a branch of Art.

Another obstacle to the progress of correct ideas in rural improvements is found in the strange apathy entertained by many against an Art, which they suppose to be subservient only to the wishes of the wealthy class, who desire to surround their palatial mansions with pleasure grounds of exquisite and costly beauty, but useless to people of moderate means and pretensions. While it cannot be denied that wealth is the principal protector of Art in general, and employs in consequence a branch of it in each respective department of decoration, by which process artistic conceptions are fostered among the masses of the people, it is nevertheless a strange phenomenon of the proverbial sagacity of our people, that a more rational line of division is not drawn when the intrinsic and practical value of this Art is judged and quite frequently pronounced as useless to the farmer or contented country gentleman. The famous parks and pleasure grounds of both continents are based on the principles learned and carefully studied from the forests and the meadows, nature's scenery; they are an artistic return to nature. Why should a farmer who wishes to protect his homestead by groves of stately trees sneer at a rational suggestion, offered by the Art of landscape planting, of how to plan and to execute the desired improvement, with a full assurance of creating thereby not merely the desired barrier against the inclemencies of the climate, but also a scene of native beauty, sure to benefit the family circle in a mental and not merely in a physical point of view?

The mission of this Art is a two-fold one in our country. It is destined to development in perfection, and in extent, finding its way into every homestead of the land on whose soil a few befitting trees can grow. The wide-spread park of the European nobleman, and the exquisite lawn and flower garden of the merchant prince of America, must be met by thousands of attractive homes of the rural population, nestled cozily in simple scenes of shade and smiling lawn and meadow. No country has a greater interest in a universal recognition of this modest Art than ours, blessed with independent homes owned by the people and not by overbearing landlords and oppressors.

The observations of many years spent in the trying service of this Art, have convinced the writer of these pages that a day of more generally disseminated practical conceptions of those features of nature's simple charms, which can really be transplanted into the close vicinity of every home, can only be expected when the dormant intelligence of the people is aroused in that direction in popular education. This branch of Art has to be engrafted into the popular mind by the same means in which all knowledge in Art and Science is perpetuated and advanced through education from generation to generation. So long as it is ignored or neglected at this tribunal of general intelligence, so long will the subject arrest the attention of but the few, who have it either from natural intuition and love of the cause, or are aroused by the eloquent example met while traveling far and wide, but remain a matter of utter indifference to the many owners of the American soil; so long will the evidences of correct rural taste be few and far apart, at least in the real agricultural districts where they might be universal, if mentioned at least in liberal public instruction.

The effort of outlining the fundamental principles involved, in plain and practical words, which can readily be understood by all, is made in a desire to show the subject from its most practical point of view, that each reader may judge in how far a general knowledge of the subject would benefit the scenic aspects of both town and country. It is intended, however, likewise as an appeal to the instructors of the popular masses of the people on the one hand, and to the intelligence of Young America on the other hand. The question of recognition of the subject in education is to be decided by the educators. The flower of our youth who throng the halls of colleges and universities are in reality more rationally interested in questions of material and artistic development of the country than those at the head of the affairs of life at the present time, and they may be in some respects more apt to conviction and progression than their sires. Broad, liberal and modern ideas of public improvements studied and assimilated in college will greatly assist the highly educated young citizen to become a leader of progress in his respective sphere of life. A few lessons learned in matters of rural taste

may therefore prove a useful investment of the college years. But we may as well expect to gather grapes from thorns and figs from thistles as to hope that practical ideas of artistic rural taste will be infused into the minds of the rising generation by our cherished systems of mental training so long as the immediate surroundings of the edifices of education are left untouched by the hand of Art, or are permitted to be improved by the merest fancy of any one ignorant of the simplest axioms of landscape gardening. If any spot of ground in this broad land deserves the refining touch of truly artistic improvement, however inexpensive it may be, it is assuredly the ground of the school and the college, in which are trained the minds and eyes of those who, in the near future, will join the column of progression whose onward course is irresistible, defying all agencies of hindrance and prejudice.

The powerful engine, propelling the mighty train of the moral and intellectual culture of this nation is fully able to protect a cause, strangely ignored for its apparent modesty's sake, yet nevertheless an important factor in the construction of the true American home, on the purity and culture of which both church and state depend for their security and perpetual welfare.

"As in the creation of the physical world, monsters and mastodons roamed and ruled amid the forming chaos, before a garden could be prepared for *agricultural man*, so in the evolution of the ultimate results in the mental and moral world, the monstrosities of fashionable, professional and fantastic life are necessarily first and fullest in their development, before the angel forms destined to keep and to dress this great garden of our God, shall walk abroad in the full majesty of their glory and their strength."—*Prof. J. B. Turner.*

PRINCIPLES OF ART.

What is Art? Should any one be permitted to raise such a question among artistic people, surrounded on every side by Art's productions? Yet notwithstanding the generality of its diffusion amongst all classes of society, many are unprepared and unable to give a rational explanation, much less a manifestation of the same, when called upon so to do. It resembles in this respect the volumes of fashionable religion afloat in our day, which many enjoy, not for the good of it, but because others do the same.

Almost everybody will admit that a colored print, a chromo, with which the community is so liberally supplied, is the product of not only one, but of double Art, the art of painting and the art of printing—of fine art and of mechanical art.

Why do we sing in church? To attract God's attention in our direction or to express the emotion of our heart, by the aid of melodious tones as praises of the Creator? Listening to Nature's unwritten, ever sounding melody, man has developed the art of Music in which he expresses the melodious phantasies of his mind, in endless variety of harmonious sounds, artistically associated. We gaze in wonder at the colossal statue erected to the memory of one of the great men of history, and recognize therein the true likeness of him whom the nation delights to honor. The statue may be cut out of stone, or may be cast in metal; it is, nevertheless, a personification of the Art of Sculpture.

In order to arrive at the true aims and purposes of Art, let us examine closely an attractive picture. For the sake of those who live solely for utility's sake, and to attract their special attention, we choose a useful subject. We take the picture of a horse. What is it that calls forth our admiration of the picture? It has two distinct causes. First, the picture is a true representation of the noble animal; each line and form is true to nature. The artist did not try to add any imaginary idea of his own, by which the likeness would have

been marred or spoiled altogether. Secondly, the picture represents the animal in greater perfection of form, and in a more spirited composure, than we generally meet in nature. The artist has painted a finer, a more perfect horse than we have ever met before. In order to do this he had to study closely all the beautiful forms of many different horses, together with all their graceful motions, and unite all the individual traits of perfection into one picture, which is thus a product of his own imagination, yet still the likeness of a horse in all particulars. Testing a fine landscape painting in a similar manner, we find each tree, each forest group, the valley with the river flowing through it precisely as we see them in nature; but the painting represents a landscape of such perfect beauty, that we are at a loss to say where we could find such a charming scene in nature. The painter's imagination has produced the type of perfection of a landscape, by combining the ideal beauty of many different scenes into one picture.

Art works, therefore, in three distinct directions. It copies, it composes, and it studies nature, from which it draws all its ideas and examples. In copying Art, imitation of the minutest detail of form and color, will be considered as perfection. In composition, the true genius of the master finds its widest scope. On this field the leading masters have won their laurels and imperishable fame.

The study of nature is a field open to all, it is indispensable to the artist who materially reproduces the patterns of nature in his work. Nor is it less indispensable to all who wish properly to judge the products of Art, who wish to be considered connoisseurs of Art, a knowledge demanded of every fit member of a truly polite society, and the absence of which will speedily be detected, however polished the individual may otherwise appear. In a wider sense the study of nature and of art exercises the most ennobling and refining influences upon the mind, and will materially assist in bringing it into full harmony with nature and thereby in harmony with the Creator. It is the broad foundation on which has been reared the æsthetic culture of mankind, which has culminated in the artistic and educated age in which we live. How great would be its benefits and blessings to the masses of the people, if fostered in popular

education, yet how unpopular is the subject with many of our learned educators!

The domain of Art is as wide as the universe, not only of nature but of imagination. It is, however, hedged in by the principle of intrinsic truth to nature. Overstepping this natural boundary line, we enter the realm of absurdity, we pervert, we murder Art. How readily therefore should mediocrity and false Art be detected, yet how often do they reap an undue reward of merit!

THE PRINCIPLES OF TASTE.

We do not speak here of people's fancies or preferences for one thing or another, erroneously called their taste, much less of their sensual or epicurean tastes, which lie at the bottom of all their troubles. We speak of taste in Art, and in polite society in which Art is truly at home. Taste in this sense implies an impression made upon others. Its first requisite is, therefore, that in order to deserve the name, the impression must please others, as well as the individual from whom it emanates. Just here much offense is taken and given also. If only pleasing to one's self, it is not necessarily taste, but mere fancy, and as many people think their fancies excellent taste, they imagine they have a right to feel offended if all the world does not approve their standard. In order to be a source of pleasure to the many, it must stand on a platform on which the multitude can meet and agree.

Referring to the principles which govern Art, we have likewise the principles of correct taste. Intrinsic truth to nature is the ground on which all can meet with satisfaction and with pleasure, in all matters relating to artistic questions. In all other departments of life, the common platform upon which we all may meet is sound judgment—vulgarly called common sense. Correct taste means therefore the approbation of the many to something composed of judiciously selected parts,

united into a harmonious whole. It is the selection of harmonious parts judiciously associated. False taste must, therefore, be a mistake made in either the selection or the combination of parts, quite often faulty in both respects. Correct taste in Art is a selection of particles of aesthetic beauty, found in the many individuals of a certain kind, a harmonious union of which produces the type of perfection of that kind. Correct taste in dress, in speech, in manners, is governed by the same principle of excellence of parts and fitness of the whole. An ill selected ribbon, a vulgar expression, or an awkward motion is often ruinous to the whole effort made.

Correct taste in religion is judicious selection of songs of praise to God, associated with appropriate words and deeds expressive of kindly feelings to our fellow man. Correct taste in our homes is congruity of the interior and the exterior of the house. Where this harmony is missing, the outside world is at liberty to suppose that art and culture are painted only on the inside walls, but not in the interior mind of the inmates, however elegant they may outwardly appear.

NATURAL TASTE. Some minds are peculiarly endowed by nature to perceive and enjoy a trace of beauty in all natural objects with which they come in contact. No work of nature, however homely it may appear, is deficient in some element of beauty which, being modest in itself is overlooked and ignored by the general observer. The mind in constant harmony with nature detects such elements of perfection at the first sight of the object. The faculty of perception is joined with a faculty of harmonious association of the stray particles of beauty, with any object and on any occasion upon which they can be fitly united. This species of natural taste is the principle of decoration by which all walks of life, and more especially the home, is made attractive.

INDIVIDUAL TASTE, is not, as has been observed above, identical with individual fancy, but is natural taste exercised in a certain direction or devoted to a certain object, or group of objects. It is, therefore, controlled by natural preferences possessed by the individual. This we call individual taste in music, or in painting, as the case may be. Man's love of Art,

varying in different individuals in the endless variety between positive love and negative indifference, is thus in one sense a testimony of his individual taste. In the other, however, it is a sure indication of the degree of development of the fundamental aesthetic principle within himself. All other faculties of his mind, the interaction of which we call his character, will in great measure be swayed by this principle, which the Creator designed to be the governor of human nature. When in full force it makes the true nobleman of nature: when weak and subdued by selfishness, that leading virtue of utility, it becomes the stamp of rudeness in human nature. This principle makes the genuine man, or the true woman, no matter in what walk of life and fortune accident may have placed them. Nobility of nature is, therefore, not confined to educated and polite society but is a boon of happiness also in the cottage of the lowly. It is a divinity sent to the "class of thinkers," as well as to the "mass of workers."

PUBLIC TASTE. Logically considered this should be a compound of the individual tastes possessed by those who make up the masses. But as such it would have no distinct form of expression. A medium harmonizing individual tastes is, therefore, necessary to express clearly the character of public taste. An element of weakness in human nature assists the shaping process not only of public taste, but also of public opinion.

Singly the mind is self-reliant, independent; when in an association with many others, a majority of minds lose their independence and consequently a part of their force. The masses become, therefore, the ready prey of certain leaders and resemble a herd of sheep in their willingness to follow. The history of the human race is but a history of the leadership of the few and the following of the many. Each epoch has had its leaders in politics, in religion, in science and in art. Public opinion or public taste is therefore an expression of certain ideas, general or artistic, entertained and in vogue at a certain time. As the necessities of daily life are ever of foremost importance in human affairs, they receive in consequence the first attention at the hands of Art, which expresses

in their design the artistic ideas of the day in which they are made. The forms of costumes and of all articles of daily use, are, therefore, the exponents of the public taste of their day. We recognize in them the standard of the culture and refinement of a people. They indicate the endless chain of progression on which the principle of taste has been developed from its crudest form to the heights of its perfection in our day. The general adoption of these forms expressed by the aid of art is what we call the reign of fashion. The greater the degree of the artistic culture of a nation, the more prolific will it be in the development of new ideas in the domain of fashion; and the more rapid will be the succession in which new models of design and fabric follow each other—the oftener in other words will fashion change.

This change of fashion is a subject replete with mystery: nay, with consternation at times to well-meaning, saving and contented people, who wonder at the constant fluctuation of fashion. "Who makes these ruinous fashions?" is a question often asked; and naturally the dry goods and millinery shopkeepers are suspected as implicated in the "corner." In justice to this much abused class of people, let it be said that the cause is a very natural one and they are, therefore, wrongfully accused. The centers of Art, those cities in which the greatest number of designing artists are congregated, are of necessity the centers from which fashion takes its start, from which it visits each hamlet of the land. Nobody needs to wonder that our "modes" come from Paris, London or New York, or from any far off city to which distance lends always an additional enchantment. This is the very way with fashion. Public taste in its identity with fashion has a twin sister in public opinion, of which it is truthfully said that it is "fickle as the wind and relentless as the grave."

Public taste in any branch of the fine arts, may be termed the accepted standard of perfection most pleasing to the greatest number and, therefore, most popular with all who judge in most cases superficially, regardless of the principle involved in their choice. The gayest colors, the most amusing forms, the most exciting music, will thus often be the taste of the masses from which all true students of art dissent if such

productions are not in harmony with the principle of refined taste. This class of the public has a standard of taste entirely their own, which is popular only in the circle of purely polite society, graced by aesthetic culture and true refinement.

Of the motors of public taste we design to speak on a future page; but one of its most powerful levers is worthy of mention in this connection. The art of printing has inaugurated a new era not only in the intellectual development of mankind, but also in the domain of Art. The invention of the art of photography and the marvelous perfection to which the art of color printing has attained, have disseminated amongst all classes of society a variety and a stupendous multitude of artistic productions, which cannot fail to elevate the standard of public taste to a height and extent of which to dream a few decades ago, would have been considered a wild phantasy. The world's treasures of Art, hoarded jealously in many galleries, are in one sense thrown open to all the world, and Art, together with all the pleasures and refining influences flowing from it, is no longer as in the past the humble servitor of wealth and power, but the daily and cheerful companion of the masses of the people, thus only fairly started on the mission assigned to it by the Creator, when he planted the garden eastward in Eden.

“*In hoc signo vincemus.*”

FLORAL TASTE.

While mentioning the principle of the art of decoration, we may have involuntarily thought of floriculture, the most prominent factor of decoration in our present day. The florist considers himself, therefore, an artist of the first-class and fortifies his claim to correct and refined taste by the charges made for his productions, which cover always three distinct items; namely, the material actually used, the time and dignity consumed in talking the matter over, and the

artistic skill needed to make up the design in style and to have it ready at the appointed time. Floral devices universally met in polite circles of society on various occasions, festive or mournful, enjoy a decided advantage over all other products of art, as they are universally admired. The material used in their composition, fragrant flowers and graceful leaves, is so fascinating on all minds, that no one is unkind enough to find fault with the disproportion of component parts, in most cases unavoidable, owing to the nature of material used. This branch of art has made the most wonderful progress within the last decade, and is recognized as the leading, the indispensable factor of decoration, with which the fashionable circles of society could in no wise dispense.

No gift of nature speaks more tenderly, more lovingly to the mind than the pure flower, awakening even in the most stoic utilitarian a feeling of delight, which has no reference to any personal gain that might result therefrom, but is longing for that mysterious something, lacking in his soul, the union of the mind and the principle of beauty. He may consider the flower the most useless and expensive thing that any one can have; but he cannot shake off the impression though only momentary it may be, made on his inward better nature. We need not wonder that flowers are simply inseparable from human society, nor that their culture is the noblest branch of Horticulture. They are justly the foremost factors of inspiration in the art of design and decoration, the universal material used by the hand of refined taste in every walk of life. And at the entrance to the tomb, when earthly love and affection are paralyzed by grief, what more befitting token can be dropped upon the grave of the departing friend, entering his last resting place, than the silent, the lovely flower. Yet we read of late quite frequently in funeral notices in high life the request "No flowers", made by the bereaved family to prevent the excess, but by no means the judicious use of flowers. Refined taste not only selects but governs also the combinations of the material used, and fondly offered by sympathizing friends. Floral decorations, however exquisite they may be, cease to be a tasteful medium of decoration when present on any occasion in excessive numbers.

RURAL TASTE.

The rural taste of our country as expressed in the grounds surrounding the homesteads of the people at large must of necessity be viewed from two different points of observation. It must be considered in accordance with the natural division of the people, as taste prevailing either in the country, amongst the agricultural classes, and taste in and around the cities of the land. The centers of population, of wealth and of culture, the large cities of the country exercise a direct influence on a certain circumference around them, which is manifested in all departments of rural life, in architecture, in highways and drives, and more especially in the home grounds of the people, who are in reality a portion of the city population. It is evident that the improvements of these suburbs, or of towns in their vicinity bearing the same relation to the cities, cannot be rationally compared to the districts in which the great agricultural masses live. A comparison of the causes, however, which have produced the scenic aspects of both opposites, city and country, may be profitable, and may open a line of rational argument on which alone some practical suggestions may be presented, by which a decided improvement and elevation of the standard of rural taste can be effected, amongst that very numerous class of inhabitants of the rural districts, who have thus far considered the question of rural improvements in their relation to scenic beauty, as a matter unsuited to the circumstances of the working, agricultural classes, or have paid no attention to them at all. It may be presumed that no one will deny that any homestead whatever is benefited in many ways by pleasant surroundings; and it may be presumed therefore, likewise, that the feasibility of any plan proposed to secure such benefits will be impartially considered by all who wish to live and move in harmony with the progressive spirit of our present day.

Let us consider, therefore, the crudest type of impulse—taste it cannot be called, which has preceded the conceptions of taste in general—called into existence by true civilization,

The original owner of the American soil was inspired by a natural impulse of deep and silent reverence for the grandeur and solemnity of his home, the forest and the plain. Scenic nature was his temple of worship of a higher Being, the unknown God of nature, to such extent as the savage condition of his existence would permit. The gentle lisplings of the zephyrs through the leafy boughs and the tree tops were to him a manifestation of the great, the all-pervading Spirit. These fundamental traits of his religious conceptions, if such they can be called, have developed those sullen, pensive and tricky peculiarities of his race. He loved the forest, its trees and shady glades, and never dreamed of using his physical strength in their destruction, but desired to preserve the native beauty of his inheritance, and to hand it down to a new generation of braves, as he had received it from his ancestors. We need not wonder, therefore, at the displeasure and vexation with which he observed the arrival of immigrants from afar, who came to destroy the forest, and to disturb the quietness of his hunting grounds. The rural taste of the newly arrived invaders being the very opposite of those of the dominant race, disputes and bloody battles and long-continued wars ensued, the end of which was the expulsion of the sons of nature, the confiscation of their lands, and the inauguration of a new, a christian era in the history of the continent.

The Indian race was followed by a race of sturdy pioneers of civilization, who braved the dangers and privations of the wilderness, to found their modest homes, where no one should hinder them from worshipping God in accordance with the dictates of their own conscience. The impulse of the pioneer was a very simple type of taste also : but the reverse of the Indian idea. He stood squarely on the basis of utility, he meant business in full earnest, and could thus not be expected to parley with the Indian principle of beauty, nor with matters of mere appearance as did the people of the city. To him a tree, or grove, or a majestic forest, incumbering valuable grounds, was simply a nuisance which had to be abated as soon as circumstances would permit.

The Indian's idea is in one sense the principle of the

fundamental conceptions of civilization expressed in every department of Art. It is a recognition, an admiration of the principle of beauty in nature, an indisputable proof of the existence of the aesthetic principle in man, which is the foundation of his character, savage though he may be. It prompts him, in the absence of a knowledge of the true God, to adore nature, or any part thereof, or an idea conceived in harmony therewith as Deity itself. It prompts the savage to decorate his body before he thinks of raiment for it—an evidence of the recognition in the savage mind of the principle of beauty, one of the fundamental ideas of civilization. The pioneer's idea is the principle of utility of adaptation of nature's gifts to human wants. It is the principle of energy, whilst the Indian idea is the principle of indolence, and yet not of indolence alone, but of envy and jealousy against all who wish to make a rational use of nature's bounties. And in passing, it may here be said, that the Indian failed to take this deadening principle along with him to his reservation, but left a goodly portion behind, as a bone of contention for the pale-faces. This negative of improvement is still alive in very many, whose plume of social standing and standard of general culture should have long convinced them of the principle of hindrance, of obstruction to rational progression, which they represent, whilst holding fast to the worst remnant of the Indian's retrograde, selfish idea.

A compound of the two principles, art and utility, is what we call civilization, culture, and refinement. It is the spirit of our present age. Viewed from a narrower point of observation it is the spirit dwelling within the innumerable beautiful and attractive grounds met everywhere within a certain radius of a progressive modern city.

We have started out to consider the difference of cause of the scenic aspects of the country and the city. It is conclusively explained by what has been said above, making even due allowance for the difference of wealth and of general culture of either section.

The principle of utility is the all-powerful motor of improvement in the agricultural districts, the principle of utility combined with art pervades the city and its suburbs. Some

call the difference, sneeringly, a mere question of gardening, and refuse to see, or at least to acknowledge, the true cause involved in the question which is one of culture, nevertheless, not of material garden culture, but of true mental culture, of which the modest service of gardening is only the manifestation of the spirit which controls its operations.

The laws of eternal progression bring forth the different generations, the last of which is always an improvement on its predecessors. That this is true in the various departments of life, is plainly manifested by all outward appearances of the country. Think of the farmer's dwelling house and its interior furniture, twenty-five or fifty years ago. Art and its cultivating influence have invaded every dwelling of the land, and the standard of strict utility is dropped long ago, replaced by one of judicious economy, proportioned to financial circumstances. Should one deny that this indwelling spirit of improvement has regenerated also the grounds surrounding the rural homes, has made them to blossom as a rose in innumerable instances, he would do great injustice to the age in which we live. But it can be asserted with the fullest truth that the standard of stern utility has been maintained more tenaciously in this than in any other department of rural life, and that the idea of harmonizing the taste displayed in the interior of the home to that prevailing in its most immediate surroundings, has never occurred to many tasteful and even highly educated people. They consider the house their residence, but the yard around it, destined by God and nature for the domestic animals, and cannot see any connecting link between the two, but utility and daily necessity. To improve the yard in any way is considered an innocent freak of extravagance which might as well be left alone, as the stock will surely destroy it. This idea prevails not only "away out in the country," but in many towns and their surroundings, where people of otherwise refined tastes and conceptions live; yet, notwithstanding, a desire to decorate the home grounds returns almost universally with the wake of Spring, and more or less is expended by almost everybody, in one way or another.

But to connect the question of what to do and what to

leave undone, strictly with the standard by which all other matters of good taste are measured, to view the outside grounds as the foregrounds of the elegant parlor or drawing room, to compare their sylvan aspect with that of the costly landscape painting on the wall, to view in one word the question of improvement of the ground in the light of Art and all surrounding refinement, this idea occurs to but comparatively few. Attempts made in improvements lack, therefore, entirely the guidance of correct taste, are dictated only by an impulse of fancy, and most people are unable to give any other explanation of what they call pretty, nice, or beautiful, than that it pleases them. Occasionally a combination of lucky circumstances develops a certain place in such a neighborhood, which by its simple grace and natural beauty is universally admired, is pronounced perfect in all respects, exactly as in the case of the beautiful grounds seen in the close vicinity of some leading city. The inward cause of the beauty of that place is simply its intrinsic truth to nature, which everybody enjoys, though perhaps ignorant of the real cause. Let us stop a farmer who happens to drive by, and hear his views of such a place. Intelligent as he is, he does not deny the beauty of the place; the æsthetic principle in him is aroused, and he admires what he sees, but the stern principle of utility tells him it would not do for himself and his neighbors, but that it is well enough for the rich who can afford such luxuries. He supposes the beauty of the place is altogether purchased by the outlay of money, and this is the cause of his fright and fear of such a luxury. Could he but be persuaded that what really attracts his mind, is not produced by money, but by the simple use made of a fixed law of scenic nature, offered in one sense of the word, free to everybody who chooses to study it and make application of it at home, then surely a good lesson would have been sent into his whole neighborhood. But he passes on. Now should that same intelligent man get stalled in a mud hole of the road, he would intelligently explain and excuse the mishap by saying, what so many of his kind believed, that it is impossible to have good roads and a good farming country at the same time and in the same place. How great is the

difference of opinion existing in the realm of progress and improvement! How necessary is it, therefore, to view all questions in the light of good reason and of sound judgment.

In the social circles of the city, life is not viewed solely in its aspects of utility, but also in those of appearance, of art and beauty. The art of design or decoration is in consequence consulted and employed in every department, and improvements of whatever kind are conducted in accordance with the principle of these arts. The art of design of ornamental grounds is employed when the owner of a certain piece of ground, in which in most cases his suburban home is erected, desires to improve the ground, not only in harmony with the style of architecture of his house, but more so in harmony with the artistic idea of his day, expecting to display thereby the nature of his own refined taste, to increase the value of his property, and to benefit the attractiveness and beauty of his city. The art which he employs is based like every other branch of art on certain fixed principles, which produce with mathematical certainty, certain effects and features of attractive beauty. There is, therefore, no groping in the dark, no useless expenditure of funds to be feared, and the results of the progress of improvement will be those desired, those on which the calculation was based, and no disappointment and loss of enjoyment of the place need be apprehended.

This is the rational cause, by some considered a mere question of gardening, which calls forth these wonderful improvements, gracing so many streets of the leading cities, and converting whole districts of their vicinity into widespread rural parks, those true exponents of American taste and liberality of enterprise, the suburban ornamental grounds in which the people really live and not only promenade on certain occasions. These residence districts of American cities extending along the charming rivers and hillsides in their vicinity, are the true landmarks of *American Rural Taste*. They are the centers from which the ideas of true and aesthetic conceptions in rural matters have been disseminated throughout the masses of the American people.

Visitors from a distance, gazing in astonishment at such

enchaining scenes of art and utility combined, attribute the difference presented to their wandering eyes, accustomed only to the agricultural aspect of their homes, to the accumulated wealth of the large cities, and take with them a feeling of regret at the uneven distribution of riches. They never think of the rational causes, which under entirely different circumstances even, would produce similar effects amidst their own homes. Others however are differently affected by what they see when away from home. The aesthetic principle within is powerfully aroused, they reason and ponder on the source of pleasure thus presented to their minds. Their natural taste is awakened, and reinforced by the eloquent lessons of art and correct taste before them, they realize the folly of mere guess work in ornamental gardening and return home far wiser in correct taste, and take with them a new idea of improvement. They avail themselves of the assistance of the art whose products they had so much admired. Their home grounds undergo a change, which many of their neighbors regard with real sorrow, supposing that the removal of a number of useless and obnoxious trees, is equivalent to the utter ruin of the place. But presently a new idea, a new design is visible to all, and thus the doom of much tastelessness and nonsensicality in that neighborhood is sealed. Happily, good taste, like malaria, is contagious, and one example of true art and utility combined, will often do a wonderful work of progression in a wide circumference around. This is the way that art in all its branches has been advanced and encouraged. In this wise were the first models of the art of ornamental gardening introduced in this country, taking root first on the picturesque Hudson, and then in all the suburbs of the Atlantic cities. Once fairly established on American soil, its blessed mission over all the land was gloriously accomplished.

The products of the art of architecture and of landscape gardening are truly philanthropic in their very nature: they are not created solely for their owner, but are a boon to all who pass by them. They are the unselfish gifts of wealth to all mankind. Their missionary principle, their blessed influence on the community at large is greatly owing to this peculiarity. They are, in consequence, the great motors of

public taste and true artistic conceptions, which find their way and imitation in endless ramifications into the life blood of the masses of the people. Wealth expended in their creation is money nobly and gracefully returned to the community amongst whom it has been accumulated. Is this not a subject of interesting study to many, who silently wish to use some of the surplus of their wealth in a channel through which their fellow men may really and constantly be benefitted?

Wealth has ever been, and will forever be the motive power of art and lead the masses to refined taste and culture. But happily, correct taste as generated by the fine arts is not the sole possession of that class of society which lives sumptuously and dresses in broadcloth and fine linen. Nature's storehouse of infinite beauty, her charming scenery, is open to all alike. The more the principle of its indwelling attraction to the soul is understood by the individual and by the masses, the greater will be the source of pleasure free to all, and the more will they learn that wisdom from which alone all true contentment springs. The closer our acquaintance with the inmost secrets of scenic nature, the greater will be the desire to associate its features of beauty with our homes, and the more will we be the recipients of all the moral and material benefits which charming nature inculcates into the affairs of human life.

"Scientia Regina Mundi,"

TASTE IN HORTICULTURE.

Agriculture produces the breadstuffs of the human family together with the raw materials of the leading manufactures of raiment and other articles of stern necessity. It feeds and clothes humanity. Horticulture, on the other hand, supplies the so-called tastes of mankind. It produces the wholesome and delicious fruits and culinary vegetables, it strews the pathway of life with flowers, and furnishes all the materials

of decoration, by which the ground, devoted to habitation, is made ornamental, distinguished from any other parcel of land. Supplying so great a variety of human wants, it must in consequence be a leading industry of the nation. Its tastes, or rather its aims and purposes, are therefore based on utility and profit, and should not be confounded with the fundamental principle of abstract taste, which is not utility solely, but utility combined with art. There is, however, a strange misunderstanding in this matter by which many things are labled *taste* which should bear the honest name of *profit*. As mention has been made of the way in which the art of ornamental gardening reached the shores of this country, and by what means it has overrun the entire breadth of the land, it may be as well to view also the progress through which American horticulture, as an art of culture, and a branch of commerce, has been developed.

A knowledge of agriculture was possessed by the human family at all times of its existence. The sternest necessities of life forced its practice and study in the foregrounds of human knowledge and occupation: the first adventurers to this continent possessed in consequence a full knowledge of how to subdue wild nature and to make the wilderness bring forth the rich yields of the virgin soil. Little indeed did they dream of the magnitude of the future empire of production, on which a mighty nation's wealth and commerce would forever rest, when laying the first foundation stones of the American Farm. With horticulture the case was entirely different. Being an art of the culture of things not only good to eat, but also pleasant to the sight, its chances in a new country were slim and problematic for many years. The mother country had fostered for centuries a horticulture subservient solely to the demands of the nobility and other monopolies connected therewith, in itself entirely useless to a country in which this motive power did not exist. A new art knowledge, founded on utility, had to be called into existence. The fruits of the European continent had to be tested as to their adaptability to this country, and new varieties, the offspring of our own soil had to be produced. Some minds, specially inspired to this mission take hold of the truly Her-

culean task. They study, cultivate and experiment and meet now and then for consultation, for exchange of knowledge and for mutual encouragement. This is the beginning of our Horticultural Societies, through which the flood of light, possessed in our day, has been disseminated, and by the aid and safe guidance of which American enterprise has achieved the marvelous results in fruit culture which make the United States the greatest fruit producing country of the globe.

Many, whose names are highly honored as authorities in Pomology and Floriculture have likewise been the advocates and promoters of artistic rural improvements, and have contributed nobly to the advancement of the rural taste of the country. The greater majority of the so-called horticulturists however have been devoted almost exclusively to the material, the paying industrial pursuits, having in consequence neither intuition nor inclination to labor in the mental vineyard of their calling. Their reunions and assemblies have necessarily had the same tenor and inspiration as the desires of their hearts, and with the exception of an occasional, gracefully written essay on mental culture, read to the meeting, matters of taste have been but seldom discussed, while the knowledge of ornamental trees and shrubs and flowers has been disseminated principally by, and for the special benefit of the nursery trade.

In the prairie states, younger in years, but fully equal to their older sisters in intelligence and enterprise, the sternest demands of necessity have forced tree-planting to the foreground of agricultural pursuits, and the imperative want of shade and protection from the excesses of the climate, has shaped the programme of horticultural societies somewhat different. The planting of shade trees, of groves, of timber belts around the homesteads and orchards is here a legitimate subject of discussion, and a world of enterprise in tree planting, not only for fruits but also for protection, for comfort and for fuel, has thereby been called into existence, thus causing the prairie home to blossom like the rose. The marvelous results attained already in this direction, led on and boldly advocated by the most intelligent horticulturists of the several states, are but the shadows of events sure to come in

the near future of a broader and more enlightened idea of western horticulture: not merely of fruit farming as in the past, but of tree and forest planting, by which the most fertile plains will truly be made the paradise of human habitation.

The attention of the foremost practical minds of the nation, not merely in a horticultural point of view, but also in the broad light of political economy, is fairly aroused in favor of the American forest—persecuted and destroyed by the march of civilization—laid waste and drained of its most valuable timbers by the unproportioned demands of the industries,—the forest once considered indestructible and never ceasing in its yields of the most indispensable materials of manufacture and construction. The nation is awakened from this dreaming slumber: it realizes the absolute necessity of adopting a more enlightened policy in the treatment of its staunchest friend, the forest, the storehouse of the moisture of the atmosphere, the regulator of the climate and the supply of untold necessities in the economy of this enlightened land. A few pioneers have banded together again to develop a rational system of American forestry, they begin to assemble for consultation in conventions, and we are truly on the verge of a new dispensation of national horticulture on the grandest scale.

ATTRACTION.

What is the principle of attraction by which the individual is governed in the selection of the spot of ground, whereon his home is to be erected and on which the increasing toil and labor of husbandry is to be expended? What is the principle which develops some sections of the country with wonderful rapidity, while other sections hang leisurely on the hands of nature, and beg in vain for the life-giving touch of industry? It is productiveness of the soil and beauty of scenery. All want to live in a rich and beautiful and healthy country.

The early settlers possessed this natural intuition in a remarkable degree. They picked the finest, the most fruitful section of each state and territory, and time has established in these the truest type of the rural population, in which the bonds of home and sacredness of the native soil are strongest. One generation of conservative people, who know how to prize the possessions of their ancestors, who really love their native place, follows the other. Rural life has here its stronghold, and exercises its beneficial influences on the body politic of the state. How different is the case in other sections less favored by this bountiful hand of nature! Their population is continually agitated by a spirit of unrest, by a tendency to sell out at any time to remove to Texas or to the far west. No real love of the native soil can here exist, while so endless a choice of new and more advantageous homes, is offered to all who wish to better their condition.

The principle of attraction is identical with the principle of values. And bringing it down to the narrow circumference of the individual home, we find it to be the same, not financially alone, but mentally likewise, exercising a weighty influence on many events occurring continually all around us. How often do we see the homestead and wide extended possession of a family sold to strangers as soon as vacated by the death of the well meaning, busy parents, for no better reason than that it offers no true attraction to the tastes of the children, who may have been at college, and when once in possession of a good modern education, not calculated for the agricultural classes, drift restlessly to the whirlpool of society in the cities! The old estate is wound up, the proceeds are divided amongst the heirs, some of whom are benefitted by the part they get, while others are assisted in the down grade of their course, and all owing to a false standard of utility at home and in education, obstinately maintained by enlightened and popular instruction.

The principle of true attraction of the home affects the life blood of the rural masses more than many are willing to admit, who seek all salvation only in the general volume of intelligence and literature afloat over our heads. Mental and material attraction of the home, is the only safeguard of the

rural masses. it generates contentment, stability of society, and benefits the state and church alike. How many jealous glances are cast over other people's lands and houses with a silent wish that a better use might have been made of "grandfather's farm", or of "our old home". How many rush to the city to return again to the country, to repent at leisure. False utility! How many mistakes are made by mortals in its behalf! How many homes are left untouched by the refining hand of art merely from the false economy of one generation, and are lost thereby to the next. How justly does the Apostle brand it as the root of all evils!

REFLECTIONS.

"We live to enjoy happiness: and the happiness of living necessarily depends very much upon what degree of convenience, comfort and enjoyment the place where we live will afford.

"The human mind is dependent upon something external to itself for its entire nourishment, culture and expansion. External nature impresses its images, and everything with which we are surrounded and associated has its modifying influence. Then let him who would cultivate a love of home contentment and the finer sensibilities, in his own mind, and more especially in the minds of his children, study to make a place *pleasing and delightful to the senses*.

"As fine strains of music greet the ear and tranquilize the mind, so, also, pleasing objects meet the sight and impart a more happy and abiding influence. Then, how important that the scenery and objects that are almost continually before our sight should be such as most delight our senses.

"With the individual that has been reared in a pleasant home—in a place surrounded by interesting scenery in the

reminiscence of *that* childhood, the fondest associations of memory will ever cling around 'the old homestead,' and, with true emotion, he may sing

"How dear to my heart are the scenes of my childhood."

"From earth, lessons of love, of gentleness, and of purity are given, in their silent language, by the majestic trees, by the humble shrubs, and by those children of beauty, the flowers of the field, adorned with every lovely tint of color that sunlight can paint on their petals, and looking up with their bright confiding eyes to Heaven for those influences on which their lives and growth depend.

"From the air comes forth in the joyous notes of the beautiful and ever cheerful birds, songs of praise and thanksgiving to their Maker, which in strains of melody give lessons to the soul, teaching it to soar upwards, like them toward the skies, in its aspirations for higher knowledge and brighter lights.

"From the waters, whether calm and placid in their quiet beauty, or leaping and dancing among their rocky mates, with sportive, cheerful voices, ascend lessons of instruction to the docile heart and vigilant understanding; while from the Heavens above, the many changing clouds rolling across the deep blue above them by day, and by night the bright-eyed stars looking down from above in silent watchfulness of the deeds done in the hours due to rest, warn and instruct, enlighten and direct the erring, the lost wanderer among the dangerous wilds of infidelity and skepticism, and exhort him to look up on high for his guides. Nature's teachers are never wearied, never discouraged. By incessant, though gentle operations, they change the rocks of the heart to fertile soil, in which the seeds they sow will grow up and flourish, yielding blossoms of hope and fruits of righteousness."

PART SECOND.

MATTERS OF ART.

THE ART OF DESIGN.

Each article subservient to the necessities of life, if decorated by the hand of Art, is made ornamental as well as useful. All fabrics of human skill display in consequence the principle of design, which make up the taste of the people. The artists who originate the designs are, as has been shown, the leaders of taste and of fashion.

The endless variety of design consists of three distinct forms, or principles expressed. It is made up of (1) Natural lines copied from animals and plants; (2) Of mathematical lines, straight lines, circles, or segments of these which in their combination make up the curved lines; (3) Of a combination of natural and mathematical lines. Examining the pattern of any fabric, we recognize at once the principle under which it has been designed. The carpet or the wall paper of our room is either a representation of leaves, flowers, birds or any other natural object, or is made up of straight and curved lines representing stripes, columns, squares or any other imaginable form composed of such mathematical lines; or it is a compound of squares or circles, into which leaves or flowers are tastefully interwoven. The beauty of the carpet or the wall paper depends, according to the rules of taste, on the correctness of the lines, and on the association of the same. We display our own taste by a judicious selection made in the variety of patterns from which we make a choice.

The selection of lines to be employed in the design of a certain piece of ground, should therefore be made in accordance with these established principles of design, which everybody takes as a matter of course, though many never take the trouble to analyze the principle of art involved in this "matter of course." For this reason the design of grounds is quite often swayed by the merest fancy, and it is just here that we see the great difference of taste displayed in the interior and the exterior of the house, producing that painful differ-

ence in the aspects of the country, when compared with those of the city and its surroundings, of which mention has been made on a former page.

The first question to be asked is, therefore, shall the ground be like a similar piece of ground in nature? Shall it be designed with natural lines, or shall it be, unlike nature, designed by the adoption of mathematical lines? In other words, shall it be laid out in straight walks and circles, around which the trees, shrubs and flowers are planted in regular mathematical lines?

ORNAMENTAL GARDENING AS AN ART OF DESIGN.

The mathematical idea of design prevailed from time immemorial to the beginning of this century. It is, therefore, called the ancient, the geometrical style of gardening. The natural idea of design was the inevitable offspring of art and advancing culture, it was born in consequence in that country which possessed those attributes of human nature in the highest degree, in England, and it is called the English style—the Landscape style—Landscape gardening.

The ancient style developed the climax of its glory in France, the country of the greatest and most extravagant monarchs the world has produced. The famous gardens of Versailles, called into existence by Louis XIV. are its truest type, the style is therefore often called the French style of gardening. The mathematical idea produced grounds entirely unlike nature, it murdered the designing idea of nature, and replaced it by scenic features, purely the wild imagination of man. It tried to wipe out, as far as possible, all similarity to nature, hoping thereby to distinguish the ground owned and frequented by the monarch and his noble band, from that seen constantly by the common people. Its eccentricities were directed against all natural forms of the ground and of

each bush or tree, which had to be subjugated to the demands of mathematics. Its scenery was one, not of Art, but of artificiality. Its designs were made however by Art, and could in consequence not be otherwise than ornamental, in many cases highly so.

Its mode of design is admired in our day as much as it ever was in the past, and in consequence adopted by many in preference to the landscape style. When applied on an extensive scale, it produces the stately avenues and majestic approaches to commanding buildings; when used in a smaller compass it gives us the neat and pleasing parterre of flowers, so universally adopted in the front of elegant architectural structures. It is thus frequently combined with the natural style, and imparts to it scenic contrasts which no other medium could supply. It is, in its proper association with its opposite, therefore, where the improver of the grounds finds the widest scope to display his rational correct taste. Yet in this association with natural objects all around, the greatest blunders against taste are frequently committed. The natural grace of a shady grove or lawn can be completely counteracted by the introduction of a straight or curved road or walk on both sides of which trees or shrubs are planted like so many toys or sentinels. Evergreen trees trained so frequently in geometrical forms and so universally admired, not for their intrinsic beauty but for their oddity, may be in perfect harmony with a spot where all else is made by art, as in the immediate vicinity of the house or amidst the flower beds, but when scattered over the lawn where all is nature, they cease to be a fit factor of decoration: they become a nuisance, not in themselves, but to all around them.

A rational choice of style of design must of necessity be made under a consideration of the nature of the ground, whether level, rolling or abruptly broken. Mathematical lines demand a mathematical conformation of the ground also. They are most suitable on level ground, but if introduced amidst the natural undulations of the ground they are a contradiction of all around them, an absurdity in consequence. If selected for ground abruptly broken, they form the terrace, an ascent to which is made by the means of steps. The

ground must thus be subjugated by artificial means to a mathematical shape—often a very expensive operation. But when a choice is made, then it should consistently be carried out by lines in harmony with its principle. A thoughtless mixing up of lines and forms of either style creates the majority of strange oddities met in many grounds. No one would think of mixing things up promiscuously in the interior of a house presided over by refined taste, but many lose this attribute when planning the improvements of their grounds.

HISTORICAL.

The ancient style of gardening being inspired by man's selfish opposition to nature, lacked altogether the principle of variety,

“Grove nods to grove, each alley has its brother
And half the platform just reflects the other.”

and carried in consequence within itself the germ of its own destruction, which was inevitably to come as soon as the artistic ideas of a future day were able to substitute something better in its stead.

To England the whole of Europe, and indeed the entire civilized world owed much of the intellectual culture it possessed, and England, therefore, was destined to decide finally the unsolved problem of the style of gardening. The greater part of its whole area being owned by the crown and church and by the nobility, it was in reality the land of estates, and necessarily the land of gardeners. A certain portion of each domain was the park and special pleasure ground of the lord and his family, in which large herds of cattle and of game were kept to furnish the principle of animation. In such a country the question of the design of ornamental grounds was a more important one than any where else on the globe.

The principle of monotony, of everlasting sameness, dwelling within the prevailing style, was a yoke which had to be shaken off some day or other; and thus an English gardener

(his distinguished name was *Brown*), struck out a new pathway in design, substituting curved lines, drawn in accordance with the shape of the ground, for straight avenues heretofore universally prevailing. He planted the trees in the same way, not in lines, but in imitation of the native groves. He copied nature. The novel idea pleased the noble lords, who saw in it the dawn of a new day in ornamental gardening. It was adopted in many neighboring estates, under the supervision of the ruling head gardener of the realm. It thus happened that a great number of gardeners got the idea of Mr. Brown, but not his genius. They copied Mr. Brown, but not nature, making a furious crusade against all straight lines and time-honored shady avenues of the innumerable estates of the kingdom.

After the death of the originator of the natural idea they invented the serpentine walk, so popular to-day with many in this country, entwining it uselessly amidst the meadows and widespread lawns of each domain. The nobility realizing the absurdity to which the new departure of design had run, had to command a halt in the confusion, and favored a return to the old idea rather than a destruction of the leading features of the land. The gardeners and the lords were thus in a wrangle, in which the leading landscape painters and poets of that day took active part, as is plainly manifested by Pope's satirical allusion to the pert gardener of his day :

“Prim gravel walks, through which we winding go,
In endless serpentines that nothing show,
Till tired, I ask why this eternal round?
And the pert gardener says: ‘Tis pleasure ground.’”

At this critical moment a middle man between the nobility and the ignorance of the gardeners appeared upon the stage. His wonderful sagacity of judgment, knowledge of art, and inborn genius infuses system into the chaos of confusion and founds the natural idea on the basis of rational and artistic judgment. It is Humphrey Repton, the originator of the term Landscape Gardening—a term unknown before his advent. A man of the highest intellectual culture, but not a gardener himself, the fraternity of the spade pronounces him a genuine imposter on their most gracious lords, and tried of

course to make his mission as unpleasant as only Englishmen can do if they try. The nobility and crown avail themselves of his advice, the leading estates of the kingdom are remodeled and improved, and thus the new-born art of Landscape Gardening is firmly established and outlined by rational principles, clearly pronounced and fearlessly defended against all its opponents. Mr. Repton tells the gardeners that every thing they do in design, and outside of it likewise, must have a visibly good reason; that every curve or line must demonstrate its own necessity; that every purely useless feature of design is an absurdity; that the mind must be satisfied with all the eye beholds. No wonder they attempted to cry him down as an "aristocratic humbug." He tells the landscape painters that a painting is a thing to be looked at, the ground to be walked over and to be used; that consequently there exists a wide difference between the art of painting and that of gardening although the artistic conceptions and principles are the same in both.

The crowned heads of continental Europe send their special artists to England to study and to copy the new-born art, which finds by this means universal adoption in every kingdom and petty principality of the continent. Each country adopts it in accordance with the peculiarities of its climate, and prevailing ideas amongst its people. The further development of the art is thus a compound of the artistic talents of all countries, and is in nowise due solely to Great Britain. The gaiety of the style, when interwoven with the mathematical idea, and liberally decorated with flowers and devices of pleasant intricacy, we owe in great measure to the genius of the French; while Germany perfected the style chiefly in principles of artistic planting, thereby producing the wonderful sylvan attractions which distinguish the parks and pleasure grounds of that country from those of any other, England included.

The art of Landscape Gardening is a compound of art as generated by a study of nature, and of correct judgment in the association of artistic ideas with the demand of utility: whereby the scenic features of the ground are brought into full harmony with the requirements of the comfort and conveni-

ence of the ground; whereby the design of the ground is adapted to the purposes for which it is destined, be it the residence of a family, the use of the public, the education of youth or the burial of the dead.

STUDY OF NATURE.

On this broad basis the culture of mankind has been developed. Civilization is the product of lessons learned from nature, and of application made of revelations appearing from time to time as inspirations from on high, to minds specially commissioned to penetrate the mysteries of her economy. A desire, dictated by stern necessity, to comprehend the phenomena of surrounding nature, to which human existence was subjected was undoubtedly the first impulse of the awakening mind. Slow and weary indeed has been the process of evolution from darkness to the stadium of light in which mind was first enabled to assume the control of nature, in so far at least as to turn her forces to the wants and amelioration of human life. Once independent of her problems and hitherto mysterious ways, human intellect had an open pathway on which to make those marvelous advances and discoveries which characterize this latest epoch of the history of mankind.

The study of nature is pursued to-day as at any former period, in two distinct directions, the study of matter constituting the material universe, and the study of form and combination of the elements of nature. The former we call science, the latter art. These are the fundamental pillars on which culture rests; in which all rejoice and are blessed in the ratio in which their mental powers can assimilate nature, a faculty on which much of their mental happiness depends. Degrees of culture vary, therefore, in indefinitely the multitude of minds, and divide the masses into various distinct classes. The most numerous of these live solely in the material realm and use of nature, caring but little for causes

founded either in art or in science, by the results and products of which all are unknowingly benefited in innumerable ways. One portion of the minority leans to science, the other to art. A combination of these distinct classes is the conglomeration of intellectual nature dwelling within mankind. The degree of culture possessed by the individual is readily recognized when measured by this universal standard.

The study of nature is a research for the causes producing the endless variety of manifestations in the universe of nature. To trace the multitude of apparently contradictory facts to their source of first cause, to recognize therein the unity of cause, to found a rational system of natural laws and corresponding results, has ever been the effort of the foremost minds engaged in the tedious task of unraveling the mysteries of surrounding nature. The successful realization of this effort we call the natural science enlightening our age, which has dispersed the untold errors and superstitions of the past, and has landed us triumphantly in the harbor of enlightenment, in which we are securely moored, thanks to the efforts of many centuries of study of nature.

The eternal law of cause and effect is universally conceded in every branch of natural science, and in its natural result, the plane of intellectual culture on which we stand. But does it hold true in the realm of form and combination? In other words, can it be recognized in the study of art likewise? Are there certain immutable first causes of the beauties and attractions of scenic nature, which when comprehended by the inquiring mind will dispel the almost universal delusion that all the unspeakable variety of scenery is the product of accident, commonly named a freak or a happy humor of nature? The seeds of vegetation are drifted to and fro by natural forces—winds, waters, or by animals. The presence of forests, be they composed of rugged pines or stately palms, is therefore fully accidental in one sense of the word, yet governed strictly by the laws of the economy of nature, conditioning their existence by climatic and many other local causes. But can we reduce the infinite diversity of combination to certain comprehensible laws of association? Can we anticipate and recognize the principle of creative wisdom with

which the stupendous universe of natural variety is designed? This is the fundamental problem of the study of nature in the artistic direction. Its successful solution will give us the key to the original garden of the Lord, nature's scenic beauty, in which we can imbibe ideas on which alone correct and rational taste in art and daily life can possibly be founded.

To guide the reader over this interesting territory, and to suggest some practical points, on which to invite his special attention and inquiry, is the object of the following pages.

A student accompanied by his teacher is supposed to start on a rambling tour to view the landscapes of our country, to study, rationally, the causes of their attraction as expressed by the term, Beauty of Nature's Scenery.

FIRST PRINCIPLES OF ASSOCIATION.

A section of the earth's surface, presented to the eye from a given point of observation, is called a landscape. Certain sections are seen in their primitive character as made by nature, showing no signs of interference by the hand of man. In others, the habitations of man appear as interwoven between primitive nature, lending to the landscape an element of variety, of increased interest to the mind, in consequence. The greater the number and proportions of the works of man, the greater will be the contrast of nature and the manifestation of the demands of human wants. Scenery is thus either primitive nature, *natural* in character, or nature combined with the signs of civilization, *artificial* in character.

CLEARNESS OF THE SCOPE OF VISION. The greater the scope of vision presented from a given point, the greater will be the variety of objects seen; the greater, therefore, is the interest to the mind. The more distinctly the outlines of objects are visible, the sharper will be the impression of what is really seen, the clearer will be the understanding of the

mind. *Vice versa*, the dimmer the outlines of objects, or the more intermixed they appear, the more indistinct will be the impression, the more the mind is left in doubt as to the real form and position of the objects, the less will be, therefore, the gratification imparted by the vision. The principle of pleasure to the mind is, in consequence, the standard by which that of beauty is established. As pleasure to the mind depends on clearness of vision, so will the degree of beauty also depend on the same condition. *Clearness, distinctness, sharpness*, is thus the foremost factor of beauty of attraction. This principle, however, cannot exist unless objects are sufficiently far apart, separated from each other, to display distinctly the true character of their outlines. Proper *separation* of objects is thus indispensable to scenic beauty.

LIGHT AND SHADE. This principle is the effect of the cause of separation, light being the space between the objects, shade the color and form of the objects proper. We pronounce a heavily wooded landscape, dark and gloomy; when wood and meadow are properly balanced we call it pleasant; when devoid of woods, monotonous and dreary. Clearness of vision and balance of light and shade produce the different moods of the mind either pleasant or otherwise. The most thoughtless observer establishes thus the standard of beauty, of attractiveness or repulsion to his mind. Beauty is therefore not as some believe, a mere fancy, but an effect produced by a certain cause.

ELEVATION, or the height of base on which objects stand, heightens the principle of separation inasmuch as it places the objects on different levels, by which the clearness of light and shade is greatly influenced; not only as to shade produced by the objects proper, but also as to light or shade possessed by themselves, imparted to them by the relative position or height they occupy. The objects standing on the highest elevations are seen in the light of the sky, which imparts to them a certain degree of light. Those standing on the lowest levels are seen in the light of a background or objects behind them which impart to them a certain degree of shade. Elevation increases, therefore, not only apparent

separation, but also light and shade. We need not, therefore, wonder that the scenery of ground having great contrasts of elevation is the most impressive.

The opposites in elevation are the *mountains* and the *plains*. Their scenery is, in consequence an opposite—one to the other. That of the mountains having the boldest contrasts of elevation, bears the most spirited type of beauty which we express by the word *picturesque*. The elevations of the plain are harmonious, variations only, connected with each other by nature's line of undulation, its true line of beauty. The scenery produced by this principle of uniformity of height, bears the impression of grace and roundness. It is called the *graceful*, the *beautiful*. The scenery of the middle ground between the two extremes must, therefore, possess the characteristic traits of beauty of either opposite—must be a combination of striking contrasts with harmonious graces. And viewing the endless variety of scenery created by this principle of compromise of extremes, by the descent of the mountain to the plain, and the restless ascent of the plain towards the mountain, we meet in reality with nature's sublimity of beauty and diversity of scenery; we meet the endless chain of variation in lines of undulation the striking effects produced by *separation*, by *elevation* and by contrasts of *light* and *shade* and in consequence by clearness of vision, or beauty. It is here that the study of nature can be most advantageously pursued; and placed on this ground of compromise, we view first the scenery of the principle of elevation, the mountainous type and next the principle of the plain, with its graceful undulations.

THE MOUNTAINOUS TYPE—THE PICTURESQUE. We take an imaginary elevated position, from which a wide extended view over a mountainous country is before us. The eye gazes in delight in all directions, and scans the multitude of sights, conveying instantaneously the impression to the mind. Almost unconsciously the preference is given to one certain direction of the vision which is pronounced the finest view, the finest landscape of the panorama. Why is the decision so speedily made? Because in that one direction the eye has the greatest

scope of vision, the variety of objects seen is therefore greatest also. Again the outlines of all objects are seen clearest, the true characteristic of each is thus clearly revealed, and can in consequence be distinctly compared with that of its neighbors. A principle of variety is thus created which is fascinating to the mind. But let us more closely analyze the source of our pleasing emotions. Why is the scope of vision greatest? The answer is, because the principle of separation is most fully developed in that view. The relative position of all the leading factors of the view enables the eye to take them all in, and to realize the light and shade which they produce. The sylvan masses of shade, placed on the various elevations of the ground stand out in bold relief, forming strong contrasts to each other. The valleys are resplendent with light which is in turn interrupted by the shades of the forest masses. The illumination of the landscape is, therefore perfect, the truest type of that charm which only a contrast of light and shade can impart.

We see by this the rational cause of the scenic effects, which in their combinations into a distinct landscape view, have called forth that degree of pleasure to the mind, which we wish to express by pronouncing the view the most beautiful of the whole panorama. We have the cause of the beauty of the landscape. Examining the landscapes seen in any other direction of our point of observation, we realize which of the principles are accidentally missing to our point of vision. In one the forests may appear too near each other, obstructing the scope of vision; the principle of separation is imperfectly represented. In another direction the outlines of the components of the landscapes may appear indistinct and intermixed, and thus the clearness of the view is lost. The grade of beauty will unconsciously be established for every view examined, in accordance with the harmony of the point of vision and the landscape.

The relative position and height of objects to the eye, conditions the presence or absence of the principles which convey the impression of beauty to the mind. The scenic effects of any section of country depend therefore on the selection of the point of observation from which they are viewed. A point

selected in harmony with the peculiarities of the contour of the ground and position of masses of forest trees, will display the landscape in its greatest possible attractiveness.

THE CONFORMATION OF THE GROUND is in itself the foundation of the landscape, imparting to it the characteristic traits discussed under the heading of elevation. The boldest elevations and their opposites, the deepest valleys, make up the true type of the scene. The variety of contour lines of the hill-sides and the valleys constitutes next to the boldest contrasts, the beauty of the scenery. In many instances the ascent to higher levels is interrupted by steep declivities of rocks but sparingly decorated by vegetation. The principle of separation forms the valleys through which the views to more distant parts is made possible. Valleys running in line or in harmony with our point of vision are the factors of greatest beauty to the view; but obstructions when running in an opposite direction. They thus become the marring features of the landscape, as seen from an unfavorable point of view. Distances between the various elevations—the principle of light—when narrow and contracted between the higher mountains, form the dark and gloomy valleys and gorges, so characteristic of the boldest types of mountain scenery. When wide and spacious they form the pleasant, smiling valleys.

THE OUTLINES. The imperative necessity of clearness of outline has been discussed above, when it was said that the degree of separation conditions, in great measure, the sharpness of outlines. To this must be added in this connection the principle of relative distance to the point of vision. Each scene has in this respect a foreground, namely, objects nearest to the eye, and a background made up of objects furthest removed from the eye. In consequence there is a middle ground between the two extremes. In accordance with the laws of vision the foreground will be seen in its real size, that is, its height and width, and in the strongest or darkest light. The further the objects of the middle ground are removed from the eye, the more will their size and their light diminish, until the objects furthest off, making the back-

ground, appear only in dim outlines and in the weakest light, vanishing thus from sight and disappearing in the sky. The landscape receives from this cause its peculiar charm of color, of illumination, changing in accordance with the position of the sun at the different hours of the day.

Objects on the highest levels of the ground, and those furthest distant from the eye, are seen in the light of the sky; their outlines are the true sky lines, which strongly contrasted by the light of heaven, become thus the most distinct, the characteristic outlines of the landscape. The outlines of all objects on the lowest levels, or of a smaller size, are seen as in front of other objects; they have, therefore, a darker light, and are not so distinct as lines contrasted by the sky. The scene has thus two sets, or types of outlines, on the distinctness and contrast of whose light the scene depends in great measure for its full share of beauty. Whatever has been said above on the principle of clearness, may be considered a natural continuation or further explanation of this subject.

SHADE. Trees, collectively forests, are the material factors of beauty and decoration of the earth's surface, without which this terrestrial ball would be a dreary desert, unfit for human habitation. We consider the subject from four different points of view. First, the association of trees with each other. Secondly, their association with scenery at large, or their distribution. Third, their association with the different elevations of the ground. Fourth, effects produced by their association.

1. Association, proximity to each other, exercises an all-governing influence on the development of trees, and consequently also on the sylvan effects which trees produce. Trees growing singly and unobstructed by others develop their true character of habit and proportions. As fully developed specimens of their kind, we admire them; as the crowning triumphs of the vegetable world, majestic trees are factors of decoration which no other product of nature can replace; they are the centers of attraction and beauty of every scene of nature.

When growing in masses the habit of the individual is materially changed. The outside ones will develop the normal

type of their kind, as far as they are not obstructed by their neighbors, and thus the outlines of boughs and foliage encircling the circumference of a mass of trees is formed, which in reality is the true principle of shade and decoration in the landscape. But viewing the trees of the interior of the mass, we find their normal type materially altered, for the simple reason that they can grow only in height, but not in circumference. The stems are thus continually elongated, drawn up, by which natural process the tall straight trunks, the valuable timbers of the industries are produced. The sylvan beauty of each tree is therefore confined to the top, all the rest is a bare trunk, or a combination of bare branches. The interior of a mass of trees is thus the very opposite to its outer leafy, graceful circumference, which latter is the true principle of decorative beauty in scenery, a feature often overlooked when works of improvement are discussed. Any one doubting the force of this difference in this connection can readily be convinced by comparing the scenic aspect of a piece of woodland never disturbed by the axe, with one into which a clearing has been made. The first is a mass of graceful foliage, the *genuine principle* of scenic decoration, the other is a mixture of foliage and bare stems, the decorative character of which is more or less destroyed. Any part of the country therefore which is undergoing a change from primitive nature to a state of culture, loses its scenic beauty in the ratio in which the outer margins of the forest lands are disturbed. The scenery developed by the remnants of the forest, namely, by bare trees, is thus entirely different from the original type of beauty. The scattered, remaining trees, though valuable as they may be, are thus not necessarily factors of beauty, simply because they are trees which give a certain degree of shade. They are quite often the very opposite of decoration, as will be discussed hereafter.

Allusion is here made to this point in this connection to show the principle of decoration imparted to any scene by the foliage masses of the trees, and the absence of this principle when the bare trunks of trees are chiefly seen.

THE CLUMP. A small number of trees, sprung up in close

proximity to each other, produces a mass of boughs and foliage which is identical in decoration with the single fully developed tree; it is a giant tree with a number of trunks.

THE GROVE. This type of association needs in reality no special definition, as it is the prevailing factor of decoration all over our country. It is a number of trees growing near each other, forming a canopy of leafy boughs overhead. The ground is clear of shrubs and brush, the stems of the trees are clean, and thus an unobstructed view to all around is enjoyed beneath this sylvan temple. In natural scenery it is a type of decoration which characterizes the sylvan beauty of many places.

THE THICKET is any mass of trees, shrubs, and spreading vines, sprung up anywhere and growing as a type of native liberty. Some of the trees, favored by special causes, assume the lead in growth and develop their tops above all the rest. They become the leaders, leaving all else around as undergrowth, which covers the ground with the darkest shade and presents an impenetrable mass of foliage to the eye. Transferring this type on a larger scale, we have

THE FOREST, the interior of which is a mass of trees, beneath which the undergrowth is found as far as light and air will permit its presence. When this is expelled by the timber, then the interior is a monotonous mass of trunks, shaded by a uniform volume of foliage overhead. Single trees, clumps, groves, thickets and forests are nature's sylvan alphabet, with which the volume of infinite scenic beauty is written. These letters are well worthy the attention of the student of nature's language.

2. **TREES IN REGARD TO THEIR ASSOCIATION WITH SCENERY AT LARGE.** Returning to the point of observation from which we have viewed the panorama of the mountains, we see at once that forests, groves and thickets are truly the characteristic features of the beauty of the landscape. Their distribution creates all that we call the expressive charm of the scenery: it gives the striking contrasts of light and shade. It is the true decoration of the landscape. A disproportioned

touch of shade, in other words preponderance of forest, will make the scenery dark and gloomy. A lack of shade will make it monotonous and dreary. When uniformly distributed everywhere the scene will lack expression, will be unmeaning. The most striking sylvan effects are due to a union of the several types of association. The mighty forest is thus surrounded by the ever varied outline of the thicket, which is in turn associated with groves and single clumps. Each mass of shade has its peculiar sylvan outline, which is an important line or element of the whole, a factor of variety and beauty.

3. THE FORESTS IN REGARD TO THEIR ASSOCIATION WITH THE DIFFERENT ELEVATIONS OF THE GROUND. Gazing over the forest-covered mountain chains and charming hillsides we realize the fulness of their mission as the element of decoration. What would this mountain scenery be without the verdure and the shade of forest? How utterly dreary and repulsive to the mind! Wipe off the forest beauty from untold steep elevations of the ground, and where would the attraction of the landscape be? And look at the graceful forests and thickets of the valleys. Are they not also indispensable to the harmonious character of the scene? How very different they are from the sylvan types of the mountain sides and summits! How round and graceful are their outlines when compared with those of the pines and oaks on the mountain side.

While gazing musingly over the widespread panorama, and wondering at the playful leaps and ripples of the mountain stream, the student of nature asks silently the question: Is scenic beauty the only cause for which the Creator has designed these majestic forests? Are they not useful as well as ornamental; indispensably necessary in the economy of nature, not merely for the supply of human wants, which they have faithfully served for a century or more; but rather as the reservoir of nature's supply of water, by which the charming stream below is constantly supplied and kept in perpetual motion, and a medium of interchange of moisture between the earth and the surrounding atmosphere? Do they

not exercise a powerful influence on the climate and the fruitfulness, of the land, and thereby on the welfare of the nation? Are these forests not really worth preserving with more jealous care than a race of enlightened agriculturists and greedy speculators have thus far bestowed upon their existence? Is *forestry* a branch of knowledge worthy of the attention of this intelligent and highly educated nation? Or is it a mere fancy of enthusiastic horticulturists?

4. WHAT ARE THE EFFECTS PRODUCED BY THE ASSOCIATION OF TREES, both with each other and with the charming scenery of the land? The simple answer to this question is endless variety. But what is variety? Does it consist of accidental intermixture of many kinds of trees and bushes, happening to grow on these mountain sides and in the verdant valleys before our eyes? Some say it does. Suppose they are right. What would be the rational result of their doctrine? In the twinkling of the eye the sylvan beauty of the landscape, due to the endless variety, would be an accidental mixture of everything that grows anywhere and everywhere. Variety would be destroyed by excess of variety, which is confusion. Nature's variety must, therefore, be something beyond mere accidental mixture. Examine the sylvan types of each locality of the landscape. Here are the forests made up of oaks, chestnuts, beech, etc. There is an isolated elevation covered with pine, and down in the valley are the graceful, drooping willows, the elms and the wide spreading maples. Here is a variety made up of masses, harmonious in themselves and in harmony with the locations in which they grow, and with their peculiar soil. They are harmonious in principle, but form a bold contrast to other masses; harmonious in themselves likewise, yet entirely different from other forms. This gives us the principle of variety made by an association of masses harmonious, and in contrast with each other. This may be called general, rough-hewn variety. But what is detailed variety, the all-prevailing principle of sylvan beauty? Examine the manner in which the different opposites in form—say the oak and the pine—meet. Can any line of demarcation between the two forms be seen? No; they mingle.

dovetail into each other, slightly and slyly here, more boldly and deeply there. The middle ground between the two opposites becomes thus the basis of the most intricate, but systematic variety nevertheless.

Now let us try the principle with what we see down in the lowlands along the stream, where elms, sycamores and maples prevail. Are the groves a mere mixture of these three kinds of trees? A few majestic trees form here a group of the type of the noble elm, there of the upright sycamore, and close by of the graceful maple. The grove is thus made up of the three prevailing kinds, distinctly united into contrasted sylvan types. Its variety is not an intermixture, but a harmonious union. The endless diversity of circumstances under which certain masses of similar trees meet with each other, and mingle on their extremities with opposite forms, creates the indescribable variety of sylvan combinations which make the true beauty of the landscape.

We have inquired into the *cause*, the effect of which is infinite variety. It is conclusively revealed by the above analysis of nature's sylvan combinations. Variety, which may appropriately be called nature's taste, is not the product of mere accident, but is produced by harmony of parts and contrasts in association. It is evident that this principle must be the fundamental basis of correct taste in every department of life, but more especially of the two arts devoted solely to the imitation of nature's scenery, the art of landscape painting and the art of landscape gardening.

LIGHT—the meadow, or all spaces between the forest masses. The distribution of the latter creates the former. The principle involved has been discussed above, and need not here be repeated. But one point is worthy of mention in this connection: The peculiar, striking contrasts of light and shade of the sylvan margins of the forest masses are due to deep recesses of light, of parts of the meadow, extending into the interior of the area covered by shade. This makes the outlines of the sylvan masses, as well as the open spaces between the latter, the very opposite of a mathematically curved line. The endless diversity of form seen in the perspective of the

forest, is distinctly expressed and outlined on the ground. It is the peculiar charm of nature's sylvan works.

WATER is justly called the life of scenery. It is the principle of animation for two reasons. (1) Because of the real animation both of sound and motion. (2) Because of contrast of color produced with the verdure of the landscape. The laws of gravity settle water in the lowest level of the ground. They thus produce the perpetual motion, by which this element works out its obedience to the dictates of nature, drifting restlessly and irresistibly toward its point of destination. The murmuring brook and the majestic river, the dripping waterfall and the awe-inspiring cataract, owe all their charms to this fundamental law of nature. The movement of the waves, be it a gentle play or a roaring commotion, is but a token of obedience to that same all-governing cause. Water imparts to the landscape a never-ceasing source of animation, which no other factor of attraction can replace when missing. But aside from real life imparted by water to the inanimate landscape, the charming contrast of its blue color, created amidst the verdure of the landscape by the water courses of the valleys, imparts an inspiration, not merely to the scenery, but more powerful still to the mind. Wipe out the silver thread of the rivers, winding their meandering courses throughout this land, and substitute the blue waters of our lakes by a green prairie, and where would the boasted glory of its landscapes be? It would have departed to return no more. The country would be green indeed in sad reality.

A landscape, the foreground of the ocean or the lake, has therefore a charm unknown to any other type of nature's scenery. The scenery of the river can for the same reason not be equaled by any other, devoid of the inspiration produced by flowing water.

The awe-inspiring gorge or inlet into the wonders of the sublimest scenery of the mountains, is desolate and lonesome, if not enlivened by the dashing water current, leaping madly from ledge to ledge, and foaming in rocky bed. The verdant dress of the earth, made up by wood and meadow, is made more charming to the mind if enlivened and diversified by the lovely blue lines of the water.

ROCKS are an important component of picturesque scenery. They are the emblems of stability, of eternal strength; the true foundation on which the glorious superstructure of nature's scenery rests. Inspired by this sentiment, we gaze at the stony cliffs and the natural walls, arising from the lowlands in sublime beauty, and recognize in them the firm supports of the higher levels. But viewing other scenes in which rocks play likewise an important part, the principle of strength is shifted into an opposite direction. Rocks cease to be the emblem of strength and stability when lying before us in fragments, piled up in sublime confusion. In this condition they point to a force of nature which has upheaved and rent asunder the seemingly strongest material of construction, scattering it like chaff over immense extents of the earth's surface. When seen in this connection, rocks are the eloquent evidences of the irresistible forces of nature.

Whenever rocks appear in scenery, the rational cause of their presence is visible also. In their association with trees and water they form the loveliest types of the picturesque scenery which would be dull and unmeaning if the green sward of the ground would substitute their rugged and fascinating forms. In mountain scenery they are in many cases the leading, all-prevailing feature to which all else seems but incidental and unimportant. The sylvan decoration of such scenes is but sparingly applied, and by its rugged types it bears the mark of scarcity of plant food and rigor of atmosphere, in accordance with the altitude of position. In such associations rocks are the principle of majestic grandeur, to which all other features bow in meek submission. Wherever met in any combination of picturesque scenery, they form the most natural wild part thereof, denoting the principle of retired solitude, but seldom touched by the tread of human feet. When associated with the habitations and industries of man, the natural charm of this type is speedily lost, so long at least as is inhabited by the quarrier.

THE GRACEFUL. The mountains have been formed by nature's wildest forces, by volcanic actions. Their scenery is therefore sublimely picturesque, the paradise of the artist and of the lover of the most exciting scenes in nature. The level

land, on the contrary, is the product of a process of deposit, of gradual accumulation of the elements which make up the fertile soil, and is in consequence most subservient to the wants of human life. Its scenery is thus the type of graceful beauty, of flowing, undulating lines, of fullness and roundness of sylvan features, of human ease, and productive plenty, and of invitation to all mankind to come and enjoy the beauties of nature. It is useless to point here especially to the great agricultural states of our country, which lie in the most fertile plain of this globe. The point of utility is sufficiently understood to satisfy everybody that the scenery of the plain is the paradise of the agricultural masses of this nation.

THE SCENERY OF THE PLAIN. The level and undulating portions of this continent express distinctly the principle of light and shade. On this basis we have two separate divisions. One part of it is forest-covered, the other is a treeless plain, a prairie.

The forest-covered portion was first invaded by the march of civilization, which has transformed the primeval forest into scenes of agriculture and of industry, eloquently expressed by the aspects of our middle states. The treeless prairie, extending over other states and territories has likewise been subjugated to agriculture, and has already developed an empire of production, by which its future history can be correctly guessed. The industry of the husbandman has to some extent supplied the pressing wants of shade and protection of his homestead, and thus the monotonous scenic aspects of the treeless prairie have been revolutionized and wonderfully improved, at least in some localities.

The neutral ground on which two extremes must meet is in almost every case a base of compromise, of which the eccentricities of either opposite must yield, in order to create something new, a compound of only the best of each extreme. To this rational principle of compromise we owe not only all that we possess in the line of common sense, but also much of the endless variety of scenery. The ground of interchange between opposites in form and color produces all variety in nature's scenery, and art operates in consequence principally on this basis. The shady forest meets thus the sunny prairie,

and with what result? The answer, is a new type of scenery. The solid ranks of the trees are broken; they open here and there to admit the shining light of the prairie. The forest throws out its *avant-gardes*, detached masses of trees, as groves or clumps and thickets across its own line into the prairie. The change is magical; the extremes of light and shade are harmoniously blended and intermingled into each other and variety is thus created. The scenic effects produced on this meeting ground of light and shade, occurring of necessity only where forests appear on the prairie, in most instances in connection with the water courses, exercises two distinct impressions and attractions to the mind. They are a pleasant change from sunshine into welcome shade, a sensual pleasure; yet, nevertheless, a mental attraction also produced by the natural simplicity of the scene, made up solely of grass and trees, associated perhaps with flowing water, yet animated by inexpressible diversity of contrasts in contour lines and sylvan pictures—the truest type of nature's design of lawn and meadow.

The sylvan types of vegetation prevailing in the different sections of the land, have of necessity a weighty influence on the scenic variety of each locality. The greater the number of different trees and shrubs growing in a locality, the greater will be the diversity of the sylvan groupings, and the smaller their number, the more uniform and harmonious will be the character of the latter. There is in consequence a wide difference in the scenic character of the sections where only the ordinary deciduous kinds of trees prevail, when compared with those where both deciduous and evergreen trees are at home. The prairies of Illinois and Missouri can thus not be expected to represent the same degree of scenic beauty as those of Minnesota and Wisconsin, where coniferous trees are met in many localities. The two opposites in type and color, the deciduous and the evergreen must naturally yield contrasts and a degree of variety which cannot be expected from either form alone.

The plain is either level or undulating. This difference in the surface, conditions the relative degree of scenic beauty, to say nothing of the other agricultural differences corresponding

thereto. A level surface has of necessity only the minimum of scenic attraction. Variation or undulation of surface is indispensable to the principle of variety, and therefore of beauty. If we take an elevated position on a rolling prairie and view attentively the endless variety of nature's line of beauty, we have a volume of instruction before our eyes, the equal of which can nowhere else in nature be found and enjoyed, a sight which should revive and strengthen the principle of beauty in every soul. This graceful line of undulation which smooths all inequalities of the ground is seen throughout all material nature. We have admired it on every step of our rambles over the mountainous terrain; we have it before our eyes here on the endless plain. It is the true inspiration of every branch of art, the fundamental principle of all design. But does it stop abruptly at the outer edge of material nature? Has it no continuation, no parallel in moral nature?

“Though I speak with the tongues of men and of angels, and have not charity, I am become as sounding brass, or a tinkling cymbal.”

RETURN.

The student of nature returns at last from his rusticationing tour, invigorated in mind and body. His friends and neighbors wish of course to know what he has seen and learned, and thus an argument on scenery begins. The student contends—

1. Any favorable impression made upon us by an object, or by a combination of such, depends entirely on the clearness of the outlines. When these are indistinct and confused the impression will be unfavorable and cannot be called beautiful.

2. Distinctness of outlines cannot exist unless objects are far enough apart to be distinctly seen.

BEAUTY

OF

SCENERY

IS

CONDITIONED

BY

RELATIVE

PROPORTION

IN

VARIETY

PRODUCED

BY

HARMONY

AND

CONTRAST

IN

FORM

AND

COLOR.

CLEARNESS OF OUTLINE.

DISTINCTNESS OF VISION.

RELATIVE
SEPARATION
OF
OBJECTS.

BALANCE
OF
LIGHT AND
SHADE.

RELATIVE
ELEVATION
OF
OBJECTS.

NATURE'S SPONTANEOUS PRODUCTION.

3. Distance of objects from the eye, and height of base on which they stand, have much influence on the clearness of their outlines, on their size and color.

4. The color of objects produces shade, the space between them is the light. There is in consequence a balance—a proportion of light and shade which makes up the distinctness of the impression, which gives the character to the vision.

5. The character of the landscape depends not only on balance of light and shade, but also on the manner in which trees are united with each other, forming masses of various dimensions and outlines.

6. Some trees resemble each other very closely in form and color, while others display great contrasts when compared.

7. A landscape where all trees look alike, has no variety; but one made up of contrasting types, is attractive to the mind in proportion to the degree of its variety.

8. Variety is produced not merely by different forms of trees, but also by the peculiar manner in which they are associated.

9. The surface of the ground, its smoothness, its lines of undulation and the degree of its verdure impart to the landscape its charms of attraction.

10. Water flows down hill, and makes on the way all the noise and animation possible. When settled in the lowest ground in a placid body, or when gently flowing as a stream, it is the greatest factor of attraction, of the beauty of the scene.

11. Rocks are not met with anywhere and everywhere, but only in certain places, in which the cause of their presence is plainly visible.

12. Ground, trees, grass, water, rocks, are the simple letters of nature's alphabet. They are the types of two distinct languages spoken by the human family. Science and industry are one; communion with scenic nature expressed by art is the other. A combination of both is the principle of the culture of our day.

Mind deals with material nature; it adapts its element to

the supply of human wants. The soul—the offspring of the Creator's own breath of life—communes with nature; it analyzes her elements of beauty and entwines them into the paths of material life. We study nature materially in science and in the industries subservient to the demands of life; mentally in its relation to the designs of the Creator. The study of matter produces scientific, utilitarian man; the study of the combination of matter into aesthetic form produces artistic man. Both studies, judiciously combined in education produce nature's nobleman—intelligent, refined æsthetic man.

STUDY IN ART.

The exalted, majestic scenery of the mountains has, as we have seen, its many lessons to the student of nature and of art, but being on so grand a scale, the latter is quite often at a loss to know how to appropriate and to accommodate its features to the narrow limits of his canvas, and thus the most practical part of the instruction escapes his observation, and is lost amidst the general inspiration which the finest landscapes infuse into the mind.

In studying the modest sylvan features and forms of prairie scenery the case is entirely different. This type of scenery may be called the simplest form of landscape; yet still it is the most instructive example of nature's principle of design. Each section or part of it is a real, a natural sylvan scene in itself, and can in consequence be readily comprehended and copied by the artist. Its careful study will initiate him into the secrets of designing nature as well as of designing art; will teach him how to surround his home with simple, native, sylvan beauty—with grass and trees, artistically associated.

While speaking of matters of rural taste in general on a former page, attention has been called to a medium of dissemination of correct rural taste. It has been said that many

country gentlemen from the rural districts return from a visit to the suburbs of the leading eastern cities with a new idea of improvement. Suppose a man from any of the prairie towns of the west returns home with a wish to improve his spacious home grounds in truly modern artistic style, such as he has admired on the Hudson or in the vicinity of Cincinnati. He begins to acquaint himself with the subject, by reading one or the other of the gracefully written books on landscape gardening. The American works on this subject are inspired by the standard works of Europe, written in English, French and German. They were written by the earliest and most prominent masters of the art and express clearly the fundamental principles of the study of nature and its applications in the art, to which we owe the parks and pleasure grounds, together with all the leading scenic improvements of both continents. Thus fairly initiated into the literature of the art, this western gentleman begins to judge the scenery he views abroad as well as at home, whether the product of nature, or of art, from a more enlightened point of view than he did before, and closely examining the sylvan scenes of the western forests in their combination with the smiling prairie, he realizes the unity of principle expressed in the books and on the grounds near his home. He wonders whether the early European authors ever beheld these prairie scenes of America, and wonders still more at the circuitous route by which he had to obtain a knowledge of how to copy nature, how to imitate her design in the improvement of his own home grounds. To any one, well versed in the literature of landscape gardening, and acquainted with the scenery of the leading works of art of Europe, the first sight of the scenery of the western and northwestern states of America is not merely a happy surprise and pleasure, but even more a full realization of the unity of cause and effect, be it foreshadowed by a European author or visible in the sylvan scenes of this picturesque and beautiful country.

Should any one ask the question if it would not be well to instruct the rising generation of these western states in a branch of art so closely linked to the interests of the people's homesteads, so intimately connected with the future improve-

ments of each locality, such an inquirer can safely be referred to the parable of the mustard seed, in which he will find a ready answer to his question.

DIFFERENCE IN ART—PAINTING VS. GARDENING. It has been said above that the art of landscape gardening is a compound of artistic ideas as generated by a study of nature with the demands of stern utility, whereby the scenic aspects of any piece of ground is brought into rational harmony with the purposes to which the ground is destined. Its object is therefore a different one from that of the art of landscape painting. The former designs the material ground, the latter the ideal picture. Both arts are of necessity based on the same fundamental principles governing the combination of scenery, both are possessed of a knowledge of how to judge and to select the elements of beauty, and of how to unite them into harmonious combinations. They are a unit in all considerations of artistic principles, but their opposite aim and purpose is manifest at the very threshold of their practical operation.

The painter has one point of observation from which he copies a given scene of nature : his picture is therefore based solely on the one point of vision, and depends for its perfection on a harmony of every particle of his work with this all-governing point of observation. The landscape artist operating on the ground, on the other hand, has at least two points of observation, sometimes even more, from which his work has to be viewed and from which it will in consequence be judged. These points are (1) a central point in the interior of the place, which is in most cases the residence, in others, in spacious grounds, as parks or rural cemeteries, one or the other points of special interest, as a bold elevation, or any other leading feature of the ground. (2) The entrance to the place, or any prominent point of the public approach to the place : from which the outside world will judge the character of the interior. Based on this fundamental ground of difference between the two branches of art, the ideas of the painter and those of the improver will in many instances widely disagree. Again, the painter delights in a picturesque, distinctly contrasted foreground of his picture, the material of

which may be a wild thicket of brush and rugged trees or rocks, which in the foreground of a house or near an entrance gate would simply be a nuisance.

The difference in principles of both arts has been elaborately discussed and debated in the earliest days of the art of landscape gardening, as seen in the writings of Humphrey Repton, the champion of improvement of the ground, and of Uvedale Price, the celebrated English painter and writer, on art.

STUDY IN LANDSCAPE GARDENING.

The study of this subject, if made in the same routine pursued in the study of nature, as discussed on the preceding pages, will be greatly facilitated. It has been demonstrated that clearness, distinctness, sharpness is the fundamental basis on which scenic beauty can only rest, without which it can simply not exist. It is evident that this principle is the foremost one likewise in art. Thus may be seen a rational cause of the absence of attractive beauty from many grounds on the improvement of which much ill-directed study and ill-expended money has been bestowed. Any mass of trees, shrubs and flowers, planted in accordance with the fancy of either the owner himself, or the jobbing gardener employed by him, cannot possibly be anything but a collection of so much shrubbery; but not a sylvan scene resembling nature. It will be seen why even the simplest forms of improvement, made up of grass and trees, of distinct sylvan groups, and distinct lawns, are pronounced beautiful by every beholder, who naturally wonders at the simplicity, yet not less at the artistic beauty, unconscious often of the real cause of his admiration. As clearness of vision cannot exist without separation of objects, it is obvious also that every available open space where a tree or bush might grow, cannot be filled up with such without destroying the fundamental requisite of

appearance, distinctness and that liberality in buying shrubbery should be balanced by a knowledge of its necessity, its utility or its uselessness and damage if planted nevertheless.

THE CONFORMATION OF THE GROUND. The ground being the foundation of all, must be considered before any question relating to objects standing thereon can be decided. When naturally suitable to the demands of scenic beauty, improvements can be made with comparatively little expense. If deformed and unsuitable to the most pressing wants of utility and beauty, the question of change is the most prominent feature, both in regard to economy and to the choice in all other matters connected with the improvement. The deformities of a small piece of ground can be altered in almost all cases with a reasonable outlay of money and should in consequence not be considered obstructions to artistic improvement. The natural shape of the ground, however, is on the other hand, the only basis from which the possibilities of improvement can be judged, as in many cases a change would either be destructive of the sylvan features, or beyond the reasonable demands of economy. The moving of ground is an expensive operation, and should be resorted to only when indispensably necessary. Correct judgment, the indispensable attribute of all rational improvements, will decide what changes in the natural surface of the ground can prudently be made, what will pay and what would be a useless expenditure of money. The decision will be the result of a comparison of expense and real advantage gained by the change.

Applying however the principle of nature's line of beauty, or of graceful undulation from one point to the other, a majority of difficulties and seeming obstructions are easily overcome, and almost all inequalities of the ground can thereby be made smooth and harmonious to the demands of comfort and of scenic beauty.

When viewing many expensive operations in leveling grounds, and in throwing up embankments and terraces in the pretended name of improvement, the artist will frequently realize that the true meaning of nature's line of undulation is a mystery to many, and that much money could be saved or

otherwise more judiciously expended, if the simplest forms of the earth's surface, the gently and roundly undulating and ever changing lines of ascent to higher levels, and of descent to the lowest levels of the ground were imitated. To change a level surface into an undulating one is, in all cases where such alteration can be made within the financial ability of the owner, the first step of true artistic improvement. A careful study of all peculiarities of the surface of the ground will suggest the most expedient way, and the most efficient manner in which the surface can be altered. The effect of taking off earth in one place, and of depositing it on the surface of the ground somewhere else, is in all cases the double amount of the work actually performed. A gentle depression made in the center of a level lawn by depositing, as a slight elevation, the material taken out on each side, will present the lawn in double proportion of undulation, when compared with the former level surface. In like manner in many cases a lowering of a sharp elevation in the ground is productive of much additional beauty of the surface, as the eye is thereby enabled to take in at a glance a greater extent of surface than could be seen before. Apparent increase of area is in all cases the natural product of the work bestowed on the judicious alteration of the surface.

A careful reflection will convince the improver how to avoid embankments and terraces along the front of the lawn or the house, and how to imprint the line of beauty on every section of his ground; and doing this he will work in harmony with the principle of nature's scenery, and consequently in accordance with the principles of Landscape Gardening.

OUTLINES. This subject is, of necessity, identical with the principle of clearness of vision. Whatever, therefore, has been said on this point in a former connection, is applicable likewise in this. In order to understand fully the nature of outlines, as being either real skylines or lines seen in front of other objects, let us view closely a single tree, or a group of trees, as it stands before us in the full light of the sky. The outlines are thus seen distinctly in every particular, however minute, contrasted distinctly also by the light of the sky.

The tree or group is seen in the maximum of its impression, or beauty.

Viewing next a tree standing in front of a grassy slope of the ground, the outline is still plainly visible, but the skylight being in this case replaced by the dark color of the hillside, the light or color of the tree is changed, is darker; its interior parts become less distinctly visible, thus reducing the clearness of its impression on the eye. Viewing again a tree in its accidental association with other trees, we find that part of its outlines is not visible, being hidden by its neighbors; the color of the tree is influenced likewise by its neighbors. A part of its outline being thus lost to the sight, and its color being similarly influenced by other trees, the tree has lost much of its own individuality, and being associated with many others, similarly affected, it forms part of a mass of foliage, the outlines of which are intermixed, whose interior is dark, made by so close a proximity of the components of the mass. The eye in close proximity to this mass of trees sees, therefore, naught but an intermixture of foliage and branches, or sees the trees in the minimum of their characteristic beauty; but when further removed from this mass, distance polishes the intermixture of parts, and thus the beauty of an intricate variety of the margin of a sylvan mass depends in great measure on the distance from the eye. A piece of ground thus overgrown by a mixed mass of trees is, when seen in its interior, naught but a mass of indistinct outlines, devoid of scenic beauty; but may be an attractive sylvan feature when seen from a distance. We see by this that outlines which are real skylines are the most prominent lines of the picture, giving to it distinctness of character, and that a dark background reduces the distinctness of outlines and shades the color of the trees, exercising thereby a great influence on the light and shade, the illumination of the scene. The more distinctly, therefore, the skylines are developed, the greater will be the sharpness and beauty of the scene. The improver surveys in consequence the situation from his two points of observation; namely, from the inside and outside of the place. He provides for outlines which will shape out a pleasing picture, as seen from the house, and from

the outside of the place. He has it in his own power to expose to the eye as much, or as little as may be desirable to be seen of the surrounding country. He opens views and shuts them off. He creates the scenery of the interior and exterior of the place alike.

On ground devoid of trees the choice of location on which the leading sylvan features are to stand, is a comparatively easy one. A clear understanding of the necessity of the leading skylines of the trees, will readily convince the improver where to plant these, and what kinds to select to create a variety of outlines.

When a certain number of trees are on the ground, the first attention will be paid to an examination of their accidental association and relative position on the ground: distinct skylines will either be visible at once or it will be clearly seen where they can be produced by the removal of such trees, which on the one hand can most easily be spared, or which on the other hand create the worst confusion. Viewed from various points, the natural association of certain masses will readily appear and it will be likewise seen which trees have to be sacrificed to the demands of distinctness of outline. Painful as this cutting down of shade trees may appear to many, it is nevertheless in innumerable cases the only remedy by which a rational improvement can be effected: and many people wonder how much the appearance of the remaining trees is improved. This is altogether owing to the creation of distinct outlines, which infuse forthwith a new idea of beauty into the scene.

Remembering on the other hand that one tree obstructs quite often the view of a dozen others at a certain distance from it, the benefit of its removal will be so much clearer. The apparent extent of the ground will be increased, and the place will thereby appear in a new light to the outside world. The woodman's axe is an indispensable weapon of the improver, and yet this should be used with great precaution and forethought. Certain trees, obstructing the plainest necessities of distinctness of outlines, should not be spared, as they often are, for no better reason than that they are trees, which have required many years in the past to grow. A deformed

tree, or one in the wrong place where it really mars the beauty of the scene, ceases to be an ornament, and is therefore unworthy the kind protection of its owner.

A former generation of pioneers, forcing the pathway of civilization through the primeval forests, had naturally a different idea of improvement from what we possess to-day, and many sylvan features of the land were destroyed at a time when clearing the ground of trees was the all-prevailing necessity of husbandry. The remnants of the old forest are, therefore, prized above all other features of the ground by the rural taste of our day. Commendable in sentiment as is this jealous protection, bestowed on the noble trees of the past, it is nevertheless in many cases the great impediment to rational improvement. Many tall and naked trees have long outlived their day of usefulness and beauty, and are a contradiction in proportion and in appearance to the improvement of a later day. Their removal is a public blessing, demanded in innumerable cases by the simplest requirements of the scenic beauty of many towns and private places, which need no other stroke of improvement than that of a well-directed axe.

A forest when judiciously broken through in various directions, where views to the distance are desired, is converted into separate groves and sylvan masses, the varied outlines of which will lend a principle of variety and of grandeur to the scene which can never be attained, if the clearing is made uniformly throughout the whole ground, whereby the minor trees are removed, but no distinct outline of any part is developed. Such places bear the stamp of uniform sameness of shade and cannot lay claim to correct taste possessed by their improvers. Quite often the principle of sameness is increased in such cases by the miserable practice of trimming to a certain height of stem, the climax of which is often a coat of whitewash applied to the trunks—to kill the bugs that many be in the bark, they say. True art knows no such mode of clearing and trimming, but cuts boldly for distinct outlines and marked scenic features, based on the principle of judicious separation of parts.

In many cases the demands of agriculture have left the

outlines of a forest in a straight line, entirely monotonous to the eye. The only mode of improvement in this case, is the breaking of the line by bold recesses, cut into the interior of the shade, by which new outlines will readily be developed.

Quite often however a grove of majestic trees forms a canopy of shade overhead, which can not be interfered with under any consideration. The ground, however, is bare and demands a touch of art, to diversify the sameness of the natural lawn. Improvers, ignorant of the principle of landscape gardening, will generally set out amidst the tall forest trees a miscellaneous number of small trees and shrubs, fancying that they will thus attain the desired effects of improvement. The result however is simply a confused mass of bushes and ill-developed trees, not a real improvement but on the contrary, the opposite of attractive beauty. A slight acquaintance with the principle of rational planting for scenic effects will teach the improver that all that is to be set out must be planted under a system of association, by which the various groups of evergreen trees and of shrubbery in general will form a new combination of sylvan outlines by which a new idea of variety and beauty of the grove will be created. How sadly are the groves in the home grounds of many tasteful and refined people, disfigured and made repulsive to the eye of taste by useless brushwood, called in this case, ornamental shrubbery which is admired not for its intrinsic beauty (which it does not possess), but simply because it is on the ground and because—as they say—it would be a great pity to cut it down.

TREES, THE PRINCIPLE OF SHADE. In viewing the mode of association of trees in scenery at large, we have seen that they appear under two distinct modes of association: they are either single trees, clumps and groves, or they form thickets, which on a larger scale, are called forests.

The amount of shade produced depends thus altogether on the mode of combination of the masses. Trees associated into clumps or groves, having clean stems and no undergrowth between their trunks, yield thus only a certain amount of shade, proportioned to the proximity in which they stand to

each other. The thicket, on the other hand, covering the ground completely, and being a solid mass of foliage, is thus the fullest medium of shade. This difference is plainly visible when the pleasant shade cast by a grove is compared with that of a forest. It is a matter of course; yet the influence exercised by this "matter of course" on the grace and variety of the landscape is unnoticed by many observers, and is in consequence ignored by many improvers of ground.

Compare as an illustration of this point a view made up solely by groves of trees scattered over a wide extent of ground, the impression is one of sameness, the scene is unmeaning to one made up of groves, or thickets, and of forest masses. How great is the difference in variety of beauty! Applying the same principle to landscape gardening, we see that groves and single trees can produce only one type of scenery, and that a combination of both modes of planting, groves and thickets, must of necessity yield variety and consequently increased beauty. Much of the unmeaning, stiff, artificial look of many ornamental grounds is owing to the absence of variety of association in planting. Their scenery is a succession of groves and single trees, all beautiful in themselves, yet imperfectly associated. Such parks or pleasure grounds may well be admired as models of the science of civil engineering, of road constructing; but they display too plainly the absence of that art by which alone the attractive beauty of the scenery can be created.

The art of landscape gardening adopts, therefore, two distinct systems of grouping, *open* planting and *close* planting, and balances the degree of shade produced by groves and thickets to the requirements of the ground. Variety of association is fully as important as variety of trees and shrubs selected. All views desired to be hidden from the sight of the interior of a place, can readily be concealed by a solid mass of foliage. A sylvan barrier to the view is usually called *the belt*, which finds its application in a great variety of cases. The height of the belt controls the view to the outside of the place. A belt of shrubbery on the margin of the place will secure privacy to the interior, and will permit a view to all objects of the outside which may combine harmoniously with the scenery

of the place. A belt of small growing shrubs will thus hide the unpleasant sight of a muddy highway without obscuring the pleasant animation created by its traffic. Wherever graceful shade and unobstructed views are desired, the trees will be associated in imitation of the open grove. Where full shade and relative concealment is demanded, the natural thicket will find its application. The improver has by this choice of association of trees and shrubbery full control over the effects of light and shade in his work. He is enabled not only to guess hopefully at certain results, but knows with certainty what effects will be produced by certain causes.

TREES AS DISTRIBUTED OVER THE GROUND. It has been noticed when viewing nature's scenery that the mode of distribution of the masses of shade conditions not only the general balance of light and shade of forests and meadows, but also the variety, the intricacy of all sylvan features. It has been seen that a combination of the different types of association, of groves and clumps sprung up around the margins of the thicket or the forest makes up the endless diversity of the sylvan effects from which the landscape receives its real hues of beauty. Art has in consequence to inquire closely into the material cause of its endless variety of the perspective. In order to find this cause we have to examine the outline on the ground, encircling the space of soil really occupied by trees and bushes: the real ground plan of the mass, the foliage margin of which presents so great a variety of light and shade of form and color. This line is a very irregular one indeed: it has many prominent points, and cuts deep inlets into the interior. When designed on paper it is considered an oddity of design by all unacquainted with its meaning. We find that the trees standing in the most prominent parts of the ground thus encircled, form the leading masses of the group, the outlines of which make up the general skyline of the whole mass. The striking contrasts of light and shade, however, are the product of the deep recesses of the line into the interior of the group. Supposing that the latter were uniformly filled up with trees, then naturally these characteristic contrasts would forthwith be

missing. Art is thus forced to copy, to adopt the principle developed and demonstrated by this broken ground line of nature's groups and combination, and just here is seen the fundamental practical difference between painting and planting. The painter copies the perspective as seen by the eye, the planter has to follow up the ground line, the real cause of that which has made the perspective, the fundamental principle of nature's mode of design. Adopting it in his designs, and using good judgment in the selection of trees and shrubs, he equals the design of nature, and produces quite often what the painter calls perfection in composition of an ideal landscape. He produces scenic effects intrinsically true to nature, yet more brilliant and attractive than those usually found in nature.

The more irregular and consequently spirited the ground line, the more contrasted and attractive will be the perspective of the sylvan mass; whereas the less the variations of the ground lines the less must naturally be the beauty of the sylvan margin. This logical conclusion ends finally with the circle and the straight line which is the opposite of all variation. The difference of appearance of a natural group and a ring or a row of trees or a hedge is thus fully explained. The straight line possesses the minimum of beauty—an assertion which many will not indorse—yet it is nevertheless true that no mode of planting does in principle so much damage to the scenic appearance as that of the innumerable straight lines of trees which produce the maximum of obstruction to the view of a place from without, and to the view from the principal windows of the house to the outside. No reference is made in this connection to the lines of shade trees which decorate the streets of every town of the land, which are the only fit mode of decoration and protection; nor to any shady avenue of private places, which may be in perfect harmony with its surroundings, but to the many useless rows of trees, planted solely for fashion's sake, or because their owner knew no better. Protection from sunshine or dust is often advanced as the object of this mode of planting, yet in most cases these demands of utility can be supplied likewise by the natural mode of grouping.

TREES IN THEIR RELATION TO THE ELEVATION OF THE GROUND. The beauty of many landscapes consist of forest-covered elevations and open valleys decked with a carpet of smiling verdure. Art copies this principle in its fullest sense. The depressions of the ground form, therefore, the lawns, sparingly and intricately interrupted by trees: the elevations are shaded by groves and forest groups. A natural balance of light and shade is thus established, which stamps the product of art as intrinsically true to nature. Whatever variations from this general rule may occur amidst the endless diversity of circumstances surrounding the improver, he will nevertheless hold fast to the principle, and harmonize thereto as far as possible the accidental presence of trees in places where they are not necessarily demanded. The sylvan features of the ground, as accident has placed them in his way, are the rational basis on which he must operate: a choice must therefore often be made between such parts thereof as can be retained and such as must unconditionally be removed. The selection will in all cases be most judiciously made if governed by this uniform standard of beauty of nature's scenes.

THE EFFECTS PRODUCED BY TREES AND SHRUBS, AS COMBINED AMONGST THEMSELVES, and in their relation to scenery of which they are the most important factors of decoration, have been discussed on various former pages. It has been stated that the endless variety produced by their association is not the product of accidental intermixture in combination, but is governed by the principle of harmony and contrast. Art is firmly founded on this basis. The material of the painter consists of a variety of colors, that of the improver is a long list of trees, shrubs and flowers. The work-shop is virtually the same: it is the study of art. Like produces like—this is the shortest interpretation possible of the word harmony. A number of like trees associated with each other form a mass which is intrinsically like the individual type of the tree. This is direct harmony. Trees resembling each other closely in habit of growth and in form will produce relative harmony, according to their degree of similarity; forms the opposite in type will be a contrast to each other. The same principle holds true in color.

We will suppose the ground to be improved is outlined by the application of the principles discussed above. It is divided into light and shade, into lawn and forest, and the spots where shade is to be, are indicated on the ground. The decision is now to be made, what to select and what to plant. As stated above the improver is placed here solely on an artistic basis, on which he will either prove a master or a mere apprentice. He assort his material first as to height and habit of growth, next as to form of foliage, and finally as to color. In separating the great number of trees and shrubs he makes two leading divisions, the deciduous and the evergreen types. These differ materially in habit of growth, in form and in color: they are the two sylvan opposites. Their difference is heightened still by contrasts presented during the winter, when the leaf trees are defoliated, while the evergreens are at the height of their glory.

The most numerous family, the deciduous type, is next divided as to the habit of growth. It yields five distinct types of form: (1) The upright, towering, represented by the Lombardy Poplar. (2) The upright, with horizontally extending branches, the oak. (3) The upright, with gracefully inclined branches, the maple and the beech. (4) The gracefully drooping, the walnut or birch. (5) The weeping, drooping willow. When dividing by type of foliage we obtain a variety of sub-divisions, the leading ones of which are (1) the large-leaved type, the catalpa. (2) The distinctly-pointed oak. (3) The full and round maple. (4) The transparent locust. (5) The delicate willow. Dividing again by color we have the glossy dark, ash and oak; the different shades of green, the silvery white, the delicately light. In like manner can the list of flowering shrubs, so indispensable in the decoration of grounds, be divided as to their time of flowering, as to color of flowers and of foliage, and as to habit of growth and height. These different modes of subdivision are indispensably necessary in order to know the real nature of the material with which the sylvan scenery is to be composed. An absence of this clear consciousness will produce the unmeaning masses of shrubbery met everywhere, and planted not only by amateur improvers, but often by pretended landscape gar-

deners. It can thus be easily seen how sylvan effects can be produced, not by mere chance on which so many depend, but with absolute certainty. A number of towering trees, as poplars, planted inside a group of maples, will develop a spirited skyline for that group. In like manner will a grove made up of various forms of roundly developing trees have an outline distinctly contrasted with that of any other group made up of other types of foliage. The outlines, the contrasts of color of foliage, in short, the true character of each part of the scene, are thus entirely under the control of the improver. A rational use of the material at hand, enables the painter to express on his canvas the artistic ideas of his mind, and enables the landscape artist to do the same, but one, ignorant of the true point of art involved, is an artist only in so far as the white-washer or house-painter is an artist in colors.

Let us take an example of three places marked out to be planted. If we do as so many others do, the three places will be filled up with a miscellaneous lot of shrubbery, regardless of distinctions mentioned above. There will thus be produced three groups, mixed alike, and consequently alike in sylvan effect when developed. Supposing that we select one kind of trees for each, the effect will be a variety, made up of three distinct types. We thus produce three distinct groups. Supposing again that we select the trees with a view to similarity of habit. Suppose we select the weeping type, we produce three different groups of weeping trees. Suppose we select the trees as to tint of foliage, or as to shape of foliage, we produce all the while distinct groups expressing certain features of sylvan beauty and we produce variety. But suppose we make one group a mass of pines, the other a mass of weeping trees, the third a mass of maples. In this case we make three distinct contrasts; in form and color. Thus far we have only made three distinct scenic features, which may be harmonious or contrasted with each other in accordance with the material chosen. The principle of variety stands thus at three. But supposing that each of the three groups is to be made up of three different kinds of trees and presently the scale of variety rises to nine, and may be

easily raised even to twenty-seven. The selection in association can be made with a view to harmony or to striking contrasts: the artist is the sole judge of what he wishes to accomplish.

It has been said above that the meeting ground of opposites is the base on which the greatest and most pleasing variety can be produced. This axiom finds its fullest application in the contrasts produced by the two most distinct sylvan types, the coniferous and deciduous classes. Two groups expressing the distinct type of either side can, on their extremities, meet and intermingle with each other, and produce thereby an indefinite variety of combination. The skillful blending of both types is in every case the cause of much pleasing contrast of form and color of foliage.

It is evident that a discussion on so endless a subject as the combination of sylvan groups might be accompanied by innumerable examples, which when described only in words would naturally make the subject tedious to the reader. We have not started out to discuss details of design in any form, but to express in as few and plain words as possible, the fundamental ideas of the art of Landscape Gardening; but not to enter into a discussion of horticultural and botanical subjects connected therewith. We have endeavored to show that this art is based on a few principles founded in nature's scenery, which can readily be comprehended by everyone who will give the subject a serious, careful thought, and which when generally understood and adopted in the rural improvements of the western homes, made in a majority of cases not for beauty's sake but for self protection against the extremes of the climate, would imprint the seal of scenic beauty into the home grounds of every one willing to adopt them and thereby to fall into line with the principles of correct taste which he acknowledges and follows through perhaps unknowingly in domestic life.

The principles governing the treatment of native forest tracts to suit them to the demands of habitation, find naturally their practical applications mostly in the wooded districts of the land. The principles of planting apply with the greatest force to the prairie home, and how great is the field which

practical art has yet to conquer. We shall, in consequence, return to this subject when we discuss the practical application of the principle of art in connection with the homesteads of the western people.

THE LAWN, THE PRINCIPLE OF LIGHT, not merely of light alone, but in reality the true principle of beauty of any place; being the natural balance of shade it should be in rational relative proportion to the latter. But in the establishment of this balance many mistakes are made which result in serious injury to the lawn. The heat of our summers is so depressing that every one longs for shade, and generally supposes that he cannot have too much of that blessing. Each open spot is therefore viewed with a silent wish to set out a shade tree on it, and thus the balance of light is continually disturbed by a well-meaning desire for more shade, while the point of proportion between the two extremes is overlooked. Most people forget likewise that there are several months in the year when pleasant light and sunshine are far more desirable than sombre shade, and fail to make their efforts on those places where shade is really most needed, not only in regard to scenic beauty, but also to solid comfort. Shade is thus scattered over all the place, and often strangely neglected where most needed. But no matter how much or how little shade is actually desired by the improver, the lawn should always be distinctly visible and not be indiscriminately planted full of young trees. This is demanded by the principle of judicious separation, without which no distinctness of outline and consequently no scenic beauty can exist, as has been conclusively proven by what has been said before.

Considering the subject however from a point of view bearing directly on the artistic design of the improvement, it will be remembered that the lines to be designed for the shady masses, if properly chosen will be very irregular, admitting the lawn deep into the interior of the shade, by which circumstance the greatest variety of sylvan contrasts is produced. Whatever benefits, therefore, the shady masses will likewise make up the true intricacy and variety of the lawn, the same cause producing the same effect on both opposites. Whatever

has been said on the conformation of the ground, applies also to the lawn, inasmuch as the lawn is the surface of the ground, decked with a verdant carpet of grass. The beautiful lines of undulation which the ground may have in a state of nature, or which art may have made, are the true charms of the lawn. Smoothness of surface and neatness in keeping are indispensable to scenic beauty as well as to the true comfort of any place; it is the principle which distinguishes the character of the ground surrounding the homestead from that of any other spot of ground in outward nature. It should always be the first objective point in the improvement and constant maintenance of any place. It will grace the home no matter how much or how little the ground may otherwise be decorated. It is the first principle of correct rural taste.

WATER. This refreshing and life-giving element is but seldom at the disposal of the improver. Its presence in scenery made by art will be the same cause of beauty as it is to all scenery at large. Its introduction into the design of the improver should be governed by the same natural laws which place it always in the lowest levels of the ground. The contour lines of a water course, a pond or a small lake, should be designed as true to the patterns of nature, in graceful, easy line, giving no evidences of interference by the hand of art. Its introduction into the plan of any improvement should be strictly guarded by the consideration of constant supply, by which alone water can be kept pure and healthy. When stagnant or impure, its presence in grounds devoted to the special use and recreation of man, is forbidden by the rules of the most ordinary good judgment. When naturally flowing on the ground its advantage to the beauty of the scenery cannot be too highly prized. The improver will therefore try to regulate it to the best possible advantage. Much might be said on the design of scenic features in which water plays a leading part, and much more on the principles of its use in fountains, yet all these considerations are foreign to the object in view, which is simply to trace the fundamental principles of nature's scenic beauty, that they may be fully understood by all who wish to make a rational use of them in the ornamentation of their grounds.

ROCKS are similar to water, but sparingly used by the improver of grounds, as a material of scenic features. They can, however, be introduced into the design far oftener than water, and are in consequence worthy of full consideration as a factor of decoration. Their use should be strictly governed by art's fundamental demand, intrinsic truth to nature. If within this pale of safety they are the material with which an endless variety of attractive scenery can be formed; if outside this rational enclosure, they are the numerous piles of rock found in so many places, on the lawn, in front of the house, or behind it, anywhere where they can be most sadly out of place. In viewing the rocks of nature we have seen that wherever they appear, a natural cause, a use of their presence is visible also. But as this is not the case with a heap of stones piled as a so-called rockery upon a smooth dressed lawn, their sensible use in that connection is very problematic. Whenever they are used by the improver there ought also to be an indication, or a possibility at least, that they might be the product of nature, otherwise they are simply indications of mere fancy, and consequently of doubtful taste. They can thus be very appropriately used on descending ground, where they will appear as cropping out of the ground; they can be attached to the foundation of the house, appearing thus as a mass in connection with the rock on which the house is supposed to rest. Wherever the mind can be satisfied with their natural connection with the ground they will be a pleasing variety in scenery provided, however, that they appear natural, or at least resemble nature more than a stone wall.

In designing their outlines the improver should always have the native freedom of natural rocks vividly before his imagination: should try to imitate the broken line which characterizes all spots where they naturally exist. In order to imitate these characteristic features, liberal allowance for space between the different parts of the rock work should be made from which trees and ferns and grasses can conveniently grow. Any means whatever should be adopted to disguise the hand of art, to counteract the principle of a wall, or the straightness of a mason's line. The imitation should be based on the

principle on which rocks appear in Nature, either in the form of a solid bluff, or as a group of fragments piled up by a natural force. In like manner should their natural association with shade and retirement be imitated; they should therefore not be placed as gew gaws in prominent positions, but should appear as only incidental accompaniments of the scenery. There is perhaps no branch in landscape gardening in which more good taste, and also more false and horrible taste can be displayed, than in the imitation of rocks. A scene, though small it may be, yet a true likeness of nature, is always a pleasure and relief to the eye; while a tasteless, clumsy piece of rock work is so much more annoying to the eye of correct taste.

THE ORNAMENTAL GROUNDS OF OUR COUNTRY.

The leading features of the scenery of our country have been discussed at some length on the preceding pages, not only to deduct therefrom the fundamental ideas of the art of ornamental gardening, but also to awaken an interest in the scenic characteristics of the country in many who may have been thus far indifferent to the sights which everybody beholds. The rural masses of this nation should surely feel deeply interested in the scenery of the rural park amidst which they live, in which they form their rural tastes, and whose bountiful material returns they reap from year to year. The subject, when viewed in this light, is not a mere matter of art or taste, but one of general intelligence of the people.

Viewing the parks and private grounds of the leading cities of the land we find the principles of the art of landscape gardening clearly expressed and verified in their scenery. We see at the first glance that the attractive beauty of such grounds consists of clearness of outlines; of distinctness of lawn and wood; of light and shade; of sharpness of lines of communication and of variety, harmonious and contrasted,

of the component parts : making up the design of the ground and the perspective outlines of the sylvan masses. We see at the same time that wherever attractive natural beauty is missing, the cause is plainly attributable to either willful or accidental violation of those fundamental conditions. No one acquainted with these principles will be misled or pleasantly humored otherwise by the gaudy displays of floriculture and rural architecture quite frequently offered in their stead. Nature and art make up the ornamental ground. Nature dwells within its scenery of wood and lawn : art designs and constructs its drives and roads and pedestrian walks, together with the summer houses and flower beds.

Some of the leading public parks are true exponents, living examples of this art, but others must be called the products of the art of civil engineering. What is the difference between the two? Landscape gardening is governed by the principle of sylvan beauty and utility combined, while civil engineering stands solely on the basis of utility, mistaking the beauty of curves and elegant roadways for the true principle of beauty. It designs and constructs all features of necessity, of comfort and convenience, and fancies that this is the ultimate of perfection. The sylvan aspects of the park are considered a minor item of the improvement, which can be left to the so-called landscape gardener, or rather, tree planter. It is thus a usual thing that this good man starts out from the principle that the people want shade, which no one will deny. He plants rows of trees parallel with the beautiful curved drives and roadways of the engineer-in-chief. Now what is the result? The principle of sameness, made up of tree-lined streets of the city, is hopelessly perpetuated in the costly public park for which the whole community is liberally taxed, obtaining in return grass and trees, and shade, and elegant drives, and cunning summer houses, and pagodas of all designs, together with a full corps of ornamental officials, but no true scenic beauty, no enchanting views in the distance, no variety of scenery.

When it is felt that the park is tame and monotonous, notwithstanding all the money already expended, then the florist is called in for assistance. The scenery of a park, it is hoped,

will now be gay enough to suit all tastes. Glass houses are erected and bedding plants by the hundred-thousand are raised to be planted wherever the park needs a soft touch of variety. This is the way in which various parks of leading cities have been weighted down with great loads of lovely flowers, all very beautiful in themselves and when properly associated with the scenery, but a contradiction to correct taste and sensible utility when present in excessive masses.

The liberal use made of flowers as a medium of decoration of parks and public places, is surely a testimony of refined taste possessed by the communities indulging in this expensive luxury. The many public flower gardens and parterres of brilliant-colored leaf plants, cannot fail to elevate the public taste of the country in a very high degree, and to foster and stimulate in the masses a love of floriculture. But when floral decorations are present in excessive numbers and disproportioned to all other features surrounding them, they lose much of their real value, becoming a thing of constant repetition, and consequently a source of *ennui* to the mind. The worst feature however, with which worthy objects can be combined, is to be used as a cover of the lack of something else which true taste would have produced if admitted in the council of the design. Floral decorations are thus often used to compensate for real scenic sylvan beauty, outside the ready reach of many who may have the good fortune of controlling public works designed for recreation and education of the masses of the people. Such works are thereby deprived quite often of their highest attribute, intrinsic truth to nature, the source of pleasure to all minds and consequently the basis on which all tastes can agree. The absence of this desideratum is often hidden by a profusion of flowers which gardeners can so readily produce, admired by the general public for their beauty's sake; but true taste cannot so easily be blindfolded, and silently regrets the limited degree of artistic inspiration possessed by the designer.

Editors of agricultural journals have often told the public of a reliable antidote against a universal evil; the swindling of the credulous by cunning sharpers. This safeguard consists, as they say, in a continuous subscription to each one of

their excellent papers, by which the intelligence of the reader will be sufficiently sharpened to withstand the plausible stories of the itinerant fraternity. A similar remedy can be recommended to the people of cities blessed with public grounds, undergoing continuous improvements of ornamentation. Let them or their representative men at least, acquaint themselves with the fundamental axioms of landscape gardening, by which their rational judgment in matters of rural affairs will be wonderfully improved, making the pathway of designing artists, who are destitute of real knowledge, less pleasant than it is in many cases. The intelligence of the public would thereby be enabled to foresee the future effect of the improvement, in many cases elaborately displayed by highly-colored maps and showy plans. It would be seen from the beginning of the planting of the ground, whether a momentary display of energy is aimed at, or whether the foundation of future charming sylvan features is being laid, and many years would not have to elapse before absurdity in design could be distinguished from true merit. The improvement of a public park would thereby be judged as correctly as the progress of public buildings, in which incompetency of the directing architect is speedily discovered and justly rebuked. The impartial observer has often silently to wonder at the difference in sagacity displayed in the expenditure of funds for public buildings and for the improvement of public grounds. In the latter the footprints of the pensioner of municipal or mystic power is frequently but too plainly visible; a matter which causes profound regret to every lover of scenic beauty.

PART THIRD.

MATTERS OF FACT.

CORRECT JUDGMENT.

It has been stated that the art of landscape gardening is a compound of artistic ideas, generated by a study of nature, and correct judgment in all matters relating to comfort and convenience, to adaptation of the ground to the purposes for which it is destined. All questions arising in the design, improvement and permanent maintenance of ornamental grounds must, in consequence, be decided by a rational consideration of the principles of art and of correct judgment. Matters of art, as discussed in the foregoing chapter, are considered by many as mere fiction, which may be used at pleasure in one direction or the other. A calm consideration, however, of the conditions under which scenic beauty can alone possibly exist, will induce the improver to inquire first into the demands of clearness of outline, due balance of light and shade, variety made up by harmony and contrast of parts and grace of surface of the ground, before he permits his stern judgment in matters of economy, convenience and comfort to make up the entire slate of the improvement of his grounds.

RELATIVE PROPORTION. We are accustomed to view all things by a certain standard or scale of measure, and to judge thereby the degree of excellence, real or imaginary. Size is established by the mind in the same manner. A rational consideration of scale and relative proportion is therefore indispensable in all questions arising in the formation of a plan of improvement.

Objects are large and small only by comparison with other objects with which they can reasonably be compared. All things must have a proper relative proportion to each other in order to comply with the plainest rules of common sense. Yet many fail to be conscious of the true standard of measure by which such matters of fact, in connection with their premises, should be judged by themselves, as the intelligence of the public views them strictly on this basis, and establishes

thereby their estimation of the owner's good judgment and correct taste. No one can escape this test of reasonable comparison, and his work is therefore just what others see it to be. The yard surrounding the homestead is for this reason a true index of the owner's taste and grade of culture. The aspect of a town is an indication of the people who live in it. They are to be judged not merely by the appearance of their business places; but likewise by that of their homes and of the ground in which they expect to be buried.

STANDARD OF MEASURE. Some objects have an established size, while others may be indefinitely large or small. The average size of a man or an animal is generally understood; such objects are therefore a true scale by which the approximate size of other objects may be measured. When a man is seen standing in front of a tombstone or a tree, the size of the latter can be correctly guessed, as every one knows that the average size of a man is about six feet. A tree, however, cannot serve as such a standard of measure inasmuch as it may be 20 or 50 feet high. The eye measures distance by the same principle of relative proportion. A railroad train seen at a distance will give a clear idea of the distance between the eye and the train, but a tree seen at a distance is no such indication. Two trees, having an unknown height, can be compared to each other, by which only their relative, but not their true proportion is established. The eye takes unconsciously the tallest, most prominent object in sight, and makes it the standard of measure. The size of a yard, or the height of the house is thus measured by the trees standing near by. The size of the yard will appear small if a very tall tree stands in its center. A house will look insignificant if unproportionately overtopped by high trees. Now should that tall tree in the yard be removed then the extent of the ground will forthwith appear larger, as the unjust measure is missing. The eye is left in doubt as to the real extent of the area of the ground. Should the tops of the trees be cut off, by which the trunks will grow more bushy and spreading, then the size and importance of the house will be increased also, as the disproportion of trees and house is removed. We learn by

the above that a known standard of measure is really a true scale to the eye : that an unknown standard can only be used in comparison, relatively to other objects ; that the removal of a standard of measure is beneficial in many cases, and that the substitution of a smaller standard will relatively increase the size of objects. We have a true standard, a relative one, the removal of a standard, or the change of a standard, as very important items in our vision.

MEASURE OF DISTANCE AND EXTENT. Distance between two given points is measured mathematically by the straight line between the two points, which cannot be otherwise than the shortest line. Wherever this straight line is indicated, and plainly visible, it must be the true scale by which the distance is measured, by which the size of any piece of ground is revealed at a glance. A parcel of ground bounded by plainly visible straight lines must therefore appear in the minimum of its size. There can be no doubt of the size of a yard surrounded by four straight lines of the fence. The more distinct the enclosure is, say by a coat of white-wash, the smaller, therefore, will the yard appear. Any design made in its interior by the adoption of straight lines, will display both grounds and design in the truest, the smallest possible size. The same principle holds true in regard to the shape of the ground. When level, the ground will appear smallest ; when undulating, the ground will appear larger in due proportion to the undulations. A curved line between two given points being mathematically longer than a straight line, will remove the points apparently further apart ; will increase the size of the ground. The substitution of a curved line for a straight one is thus of necessity an increase of size, which can be adopted in the inside, in the design of the ground. The enclosure however is a fixed fact which cannot be altered. The sight of the straight line can, in great measure, be counteracted by curved outlines of trees and shrubs along the line, which when closely planted to have foliage to the ground will fully break up the sight of the straight fence line, and will relieve the eye from the monotony of the enclosure.

RESTRICTIONS BY CORRECT JUDGMENT. The advantage offered in the substitution of curves for straight lines can however be abused if not guarded by the stern demands of common sense. A curve must always show the cause for which it is made. If devoid of this rational explanation it will appear a mere notion of the designer. Its course must, in consequence, be justified by the shape of the ground and by objects along its way, which make it a necessity. It will readily be seen how wide a field is open to the designer of grounds, to comply with the requisite of correct judgment. It will be seen why the serpentine line, so often adopted and admired in grounds, is contrary to correct judgment and in consequence beyond the line of correct taste. The fundamental laws of vision must in this connection be considered. It tells us that the objects nearest to the eye are seen in their full size and that their size diminishes in ratio to the distance from the eye. The tallest tree nearest the front fence of the place, being constantly seen by every passer-by, is thus the nearest scale by which all else will be judged. It is in consequence the cause of the greatest disproportion; more so than other trees inside, perhaps equally high, yet further removed from the eye.

All calculations on design and improvement of ground must be based on this principle of scale and rational proportion. A wide field is thus open to the improver to establish a scale of relative proportion by the removal of a true standard of measure, or by substituting another scale therefor more suited to objects all around. The eye is thus pleasantly deceived and left in doubt as to the real extent of ground and true relative proportion. Imaginary space is what the improver is really striving for when skillfully concealing the true standard of measure.

TRUE STANDARD OF MEASURE. Sound judgment demands the maintenance of a real scale, absolutely true, when the question is to be decided of what can be put on the ground; what can naturally grow thereon or not. Young trees are not considered toys, which can be set out at pleasure, but are viewed with regard to their future size. A small piece of

ground, which will admit a few groups of trees and shrubs, will not be designed as though it were to be a park on a small scale.

Good judgment knows no miniature work of any kind: it never designs a feature, the disproportion and uselessness of which are apparent at first sight. When drawing the lines of walks, it reckons on full grown persons, not little children, to make use of them. It is, however, a necessary and an ordinary practice of planting the groups of trees and shrubs denser than they can be when in their various stages of development. The calculation is made to thin out gradually as vegetation may require increased space. Clumps and groves thus closely planted will produce immediate effects which could not be expected if only the number which finally can stand on a certain spot should be planted at first. The planter has it in his power to create forthwith such effects as will foreshadow the future development of his groups, remembering however "a hidden power at once his friend and foe—'tis vegetation."

NECESSITIES. Roadways of any kind, whether drives or walks, must ever be considered what they are in reality—necessities. Their number and extent will therefore be reduced to the minimum of necessity, never exceeding actual use and utility. A useless walk is truly the most useless thing on any place. Not only economy in first construction, but more so, economy and ease of perpetual maintenance of the ground, should be the guide in this matter. The lines should always be chosen in accordance with the shape of the ground: should be drawn in graceful, easy curves, avoiding, as far as possible, sharp bends, which always appear like elbows when seen from a certain distance. The lines selected for the roadways, together with the grade established for their surface, become the governing lines by which the surface of the ground is harmonized with the road grade adopted. The undulations of the ground will explain and justify the choice of the line: the road, in other words, will appear as located just in the place where the conformation of the ground suggested it should be. This pleasing effect cannot be produced unless all traces of the work of construction are removed. The cuts in

the surface, and fills above the natural surface, must be harmonized by gentle sloping of the ground, whereby the extremes, or cut and fill, are made to disappear. The same principle will be maintained in planting. The roadway may be made as running through a pleasant grove, or past some leading clumps or prominent single trees. All objects along its way should reconcile its course. The art consists in a skillful hiding of the hand of art.

Ars est celare artem.

THE HOME GROUNDS.

"And the Lord God planted a garden eastward in Eden: and there he put the man whom he had formed."—GEN. II., 8.

SIMPLICITY OF DESIGN. Simplicity is the mother of beauty. This axiom of art and correct taste is learned from nature—whose ideal type of beauty is simplicity of form and of combination. The simplest scenes of the landscape made up of verdant grass and shading trees are ever most attractive to the mind longing for repose and quietude—grass and trees become thus the indispensable companions of the rural home, in a material as well as in a mental sense, and are the principal material of the improver. He seeks to imitate therewith the charming pastoral scenes of nature, which he has often silently admired, with a deepfelt wish to remove some of their elements of beauty into the closest proximity of his home. This impulse inspires him in his efforts in the improvement and decoration of the limited space of ground which surrounds his residence. He feels the necessity of grateful shade to shield the homestead from the glaring sunshine of our summers, and realizes the imperative demand of protection against the storms and blasts of winter. The eye longs for the relief which only verdant grass can give, amidst the endless variety of sights of daily life.

Viewing the area destined to be the ornamental ground, most usually called the front yard of the house, two questions can be asked. The one is, what sylvan scene might nature have produced on this spot of ground? The other is, how many different walks and fanciful beds of shrubs and flowers can be designed on this space? A rational answer to the first question will suggest the adoption of the natural, the simple plan of improvement. A wise answer of the second question will lead into experiments in the art of design, always certain of sharp criticism of the passing world, which the improver has to take as good naturedly as he can. The result of the improvement made on the natural plan will be pleasing to everybody; will be admired for its simplicity and truth to nature. It stands on a basis on which all can agree and with which they will be pleased. Intrinsic truth to nature is the safest plan to be adopted, no matter how large or small the ground may be. The correct judgment of the improver will readily decide how much to plant or what to remove from sight, while his artistic judgment will guide him in selection of how to plant and what to select for planting. He aims to produce a distinct scene made up of lawn and groups of trees or shrubs—remembering the imperative necessity of balance of light and shade. He tries to make the surface of the ground as pleasantly undulating as circumstances will permit, and to establish on it a luxuriant sward of grass. He operates throughout with the simplest material of decoration, shade trees and verdant grass. The scene produced will be pleasing to the eye, but its beauty may be increased by the judicious addition of bright flowers.

Each rural home can be graced by this simple mode of decoration. The material is used universally by all. The association, however, differs in many cases materially from the simple natural plan, displaying the fancies and notions of the different owners, which frequently fall short of the virtue of correct taste, pleasing to all.

ECONOMY. It is self evident that the simplest plan will likewise be the most economic one, both in regard to the first work of improvement, and to perpetual maintenance of the

ground. A smooth, well formed lawn, shaded by pleasing clumps of trees, and diversified by sharply defined groups of shrubs and flowers, is easily kept in perfect trim and order the year around ; it is indeed a thing of beauty and joy forever.

The actual work of improvement, when confined to the smoothening and grading of the ground, offering, thereby, all possible facilities to the growth of a luxuriant stand of grass, is a simple and easy one in almost all cases, requiring only ordinary good judgment used by the farmer in every work of proper tillage of the ground. He knows full well how to plow, to harrow, to roll and dress the ground so that it will produce a valuable crop. Let him but use the same efforts in the ground surrounding his homestead, and a fine and inviting lawn will be the natural result. The luxury, if such it may be called, can be enjoyed by every family dwelling in the rural districts of the land, and every economic effort made in its behalf, is labor bestowed on a worthy object, the basis on which all further steps in the decoration of the home ground rest, and on which they depend to fulfil their intention. Good judgment in economy will prompt the improver to restrict the design and construction of roads and walks to the basis of stern necessity solely. It will never permit the introduction of a purely useless feature, the constant maintenance of which will be a perpetual expense and annoyance. It will produce the greatest degree of comfort and convenience wrapped in a simple sylvan scene of grass and trees, for the least possible outlay of money, expended in original construction and perpetual keeping.

CONGRUITY OF PARTS is generally understood in all departments of life, but strangely disregarded by many in their grounds. It means everything in the right place. It implies that objects should be rationally associated with each other, that deformed trees, the very opposite of decorative beauty, should not be retained in the ground devoted to the ornamentation of the homestead. Could a variety of objects, the very negatives of decoration, be silently removed from innumerable grounds, how great would the improvement be, how wonderful would be the relief to the eye of correct taste. The good

judgment of the improver makes, therefore, a judicious selection of everything that happens to be on the ground, removes all marring features, and prevents the introduction of anything that will be a contradiction to all around it in the nearest future. All planting is, therefore, done with a view to the future—not as a mere amusement of the moment.

The difference in the object in view and in the manner of growth, existing between fruit and ornamental trees, will convince the improver that the former should be planted in a place where they can be properly cared for, and cultivated, and where they will safely yield their yearly returns to the household, without being exposed to the constant temptation of the outside world. Good judgment will decorate the front yard with shade and ornamental trees and shrubs, and keep all fruit-producing vegetation in the domestic part of the premises, and will decide in how far utility can harmoniously and rationally be combined with decoration. In grounds of small extent, surrounding pretentious residences and fronting on the most frequented highways, the effort of combining profit and beauty, is quite often a very futile experiment, ending invariably in disappointment and much vexation to the owner. True economy will draw a line of demarkation between the two, will devote a certain area of the ground, however small it may be, to ornament and use the balance of the ground to the purposes of utility.

RELATIVE PROPORTION OF PARTS. The residence and the trees and ground surrounding it are involuntarily compared with each other. Their relative proportion is, therefore, the foremost consideration in rational improvement. Whatever has been said above on the principle of balancing the standard of measure of height and extent of ground, finds its fullest application in this connection. Limited extent of ground is met by the improver's judgment in offering to the eye a scale of comparison by which it will appear in its greatest possible extent. Lines of graceful undulation and curves of lines of communication are used to wipe out the shortness of the mathematical true lines of measure. The tallest, most disproportioned trees are either removed, or reduced in height,

by which the undue standard of measure is successfully counteracted. The tallest trees standing nearest the public road, where they are most prominently seen, exercise naturally a greater influence on the eye than those further in the interior of the place. The first attention is therefore paid to these leading factors of disproportion, and their removal or reduction in height is demanded by the sternest rule of correct judgment. The force of this necessity is however often sadly ignored, and various other modes or experiments in improvement are tried, which must of necessity utterly fail to give the desired relief so long as the true cause of disproportion is retained. More real, rational and economic improvement can be effected by the use of sound judgment in relative proportion than by any other line of argument, quite often far-fetched and erroneous in principle.

BALANCE OF LIGHT AND SHADE. The improver divides the ground into light and shade, into lawn and wood, to suit his preferences for either extreme. The subject has been discussed at some length on a former page, and need not be repeated; the imperative necessity, however, of a balance distinctly visible, and characteristic of the ground cannot too often be mentioned and attention called thereto. It is the line of demarkation between art and mere guess-work in planting; between sound judgment and the absence of rational consciousness in improvement. Balance of light and shade is the principle of expression, of beauty, of the landscape. Why should it not be likewise the very soul of attraction of the home grounds, in which the moods of the mind are constantly formed, be they those of cheerfulness and pleasure, or gloominess and indifference to all around? Are the home grounds not the educators of the mind? Did the Creator place man in the garden for no other purpose than that he should eat and work therein?

ROADWAYS. The choice of lines of communication between the various parts of the ground, the roadways—be they drives or pedestrian walks—is governed as has been stated on a former page, by a preference for either mathematical or curved lines, accommodated to the natural shape of the ground. Attention

has then been called to the fact that mathematical lines are only suitable on level ground or under such conditions where the ground is artificially conformed to mathematical principles, and that the introduction of a straight roadway over undulating ground, is a contradiction to the conformation of the surface, a marring feature therefore of the design, denoting a want of correct judgment and taste alike. Taste and economy choose in most cases the natural plan of design and improvement, and select the shortest possible and most advantageous route between the point of entrance and the house. In the small grounds allotted to the dwellings of towns, the adoption of a straight line from gate to front door of the house, is quite often a matter of absolute necessity, and explains itself at first sight to the eye of common sense. The ground on either side of the straight walk may, in such cases, be shaped and planted on the natural plan and will, nevertheless, appear harmonious, although intersected by the straight walk. The apparent necessity excuses in this case the incongruity of the design. This rational excuse is, however, lost the moment that it is manifest that another, a natural line, might have been chosen in the place of the straight one. In many cases a change is readily made possible by a change of the point of entrance removed from the point just opposite the front door of the house, and will invariably cause an increased appearance of extent of ground. Whenever possible the entrance should not be located opposite the front door, whereby the true scale of extent of ground between the house and entrance gate is removed.

In grounds of larger extent the choice of the line of approach is a very important feature of the design. It should in no case appear as a selection of a longer line than is really necessary. This reconciling evidence of necessity is demanded by correct judgment which recognizes each design of uselessness or individual fancy as an evidence of doubtful taste. The approach to the house cannot stop abruptly in its front, but must always show a graceful turn either to the rear part of the house, towards the stable, or into its main line for a return of vehicles. It should be spacious enough in all its

parts to facilitate easy and convenient driving. Its width should be proportioned to its length and to the dimensions of the front of the house. A contracted, narrow drive leading to a commanding building is always a sign of very contracted views of correct taste. The entrance to a place should be chosen to gain the most imposing prospective view of the house at first sight when entering. Where this is impossible under surrounding circumstances, the approach road should strike in its course this favorable point of vision, and should appear as the most pleasant and inviting line to the house which could have been chosen.

The pedestrian walks, made necessary for communication with all points of the ground, are designed with a view to convenience and to grace of curves: the use and necessity of each part therefore should be plainly visible: no useless twist or serpentine turn should betray the notion of the improver. Designed in this rational and artistic manner, they are leading ornaments of the design and factors of increased interest of the ornamental grounds. Devoid of the protection of common sense, they are negatives of good judgment and refined taste.

A discussion of the modes employed to locate the roadways on the ground, to establish their grade, and to construct and properly drain the same, is beyond the object of these pages, being a legitimate branch of the art of civil engineering. One point, however, deserves special mention in this connection. The lines of all roadways should be graceful curves and true parallels as far as their course permits an even width. At the point of intersection with each other the connecting points should be easily rounded off to show no stiff corners. The beauty of the ground will at all times depend greatly on the sharpness and flowing grace of the borders of the roads.

THE SHAPE OF THE GROUND. Whatever has been said above on this subject applies in full force in this connection. The lines of roadways being chosen and brought down to the grades established for the same, the conformation of the ground is harmonized thereto, and gently undulating surface lines will thus connect the various parts of the lawn on which the road will appear as located in the lowest grade. The more

naturally undulating the lawn will appear between the borders of the roads, the greater will be its impression, denoting the highest degree of polish to which the ground could possibly be brought. The nearer, on the other hand, it resembles a flat piece of ground on which a few curved lines have been designed, the tamer and more ordinary will the ground appear. An artist's talent in drawing graceful curves, either on paper or on the ground, is not sufficient by any means to make him an artistic improver of the ground, if he has not also a full and practical knowledge of how to harmonize the surface lines with the curved lines of the design. Much of the sameness and flatness of many so-called ornamental grounds, arise from this deficiency in the designing head. Plans on paper, though showy and highly colored they may be, are useful therefore in most cases, only to a certain point. The real touch of beauty and the boldness of art cannot so easily be painted on paper, but must be added during the progress of the work. Yet this is a point which many learned engineers, equipped with a full supply of instruments and field hands, refuse to acknowledge, though they know it well.

THE GROUND PLAN AND THE PERSPECTIVE VIEW. The ground plan of a house shows the foundation wall of the building and the interior subdivision of the space into various apartments, some of which are designed to be the living and reception rooms, whilst others are devoted to domestic purposes. The plan of elevation conveys a clear idea of the architectural style and character of the structure. In the improvement of a given piece of ground, the ground or working plan denotes the lines chosen for the roadways, and groups of trees, shrubs and flowers. It is in reality the design of the ground which varies in endless variety of cases from the simplest lines of a plain grass plat, shaded by a few trees, to the elaborate, artistic design of an extensive ornamental ground. The perspective view of the ground, as seen from the outside, is made up of the house and the surrounding trees and leading groups of shrubbery in the interior. The ground plan is made to suit the owner's tastes and preferences, and it is identical with the interior arrangement of the house, which

in one sense belongs solely to the owner. The case is different, however, with the perspective sylvan view of the place and the architectural character of the house, in which the public is a part owner, in which it is at least quite prominently interested. The many houses and the many sylvan masses make up the town or the rural districts, by the aspect of which the whole community is justly and correctly judged. The interior of a mansion may be elegantly furnished, may hide rare treasures of art, yet if its exterior be common or unpretending, the community is deprived of a certain degree of outward appearance of wealth and culture.

The same is true of the grounds, which may be rich in choice flowers and arboricultural treasures. Its sylvan outlines, however, may be a wild mass of trees and intermixed foliage, in which no sign nor shadow of correct rural taste can be discerned by the outside world. The community is deprived in consequence again of a certain amount of enjoyment which wealth and culture would yield if directed in a more public spirited channel.

THE PRINCIPLE OF IMPROVEMENT. May the writer be permitted to call attention in this connection to the object of these pages, which is solely a desire to lay before the intelligent members of the rural population, a rational plan by which the natural laws of vision, producing the conceptions of that which is really seen, can be used by the mental power of correct judgment, to shape the scenic features which surround them on all sides. This is the simple meaning of improvement of the grounds surrounding the individual home and making up collectively the town or section of the country in which one lives.

A clear knowledge of the principle of attraction exercised by nature upon the mind, we call artistic ideas. Correct judgment accommodates these ideas to the wants of each piece of ground, on which a homestead is erected. The visible evidence of these ideas of the beautiful in nature, of art combined with the rational demand of utility, is what we express by the term Rural Taste. When the evidences of artistic ideas are wanting, then the outside world pronounces

the taste expressed, as uncultivated, as crude and low. It has been said above that nature's beauty is simplicity of form and combination. Grounds decorated with the simplest types, sylvan groups and verdant grass, are therefore the most beautiful likewise, and express true taste. True taste is in consequence not an evidence of expenditure, not the product of wealth, but can be expressed by all who improve their grounds, in the simplest mode by sylvan groups and verdant grass, the material used by all, for beauty as well as utility's sake alike. But let it be distinctly understood that the material is not its evidence, but the combination of the same.

The owner of a piece of ground accidentally shaded by majestic trees, and covered with a verdant turf, cannot be considered a man of taste as long as he leaves his beautiful grove in such a state of nature as will indicate that he has never used any rational judgment in the restoration of a natural balance of relative proportion between the various trees of his grove and the house and all around it; nor that he has paid any regard to the rational demands of a balance of light and shade; nor that he has made the attempt to round off the accidental, stiff outlines of the masses of foliage. That man may buy flowers, or may plant shrubbery to his heart's content, by which the surroundings of his residence may be made highly ornamental and pleasant; but so long as the perspective view of his place is naught but a broken parcel of the former forest, so long is the community deprived of a trace of scenic beauty, deprived of one evidence of rational improvement, so long will the outside world say that a tasteless man lives beneath the charming shade of the grove.

Another man, the owner of a treeless tract of land, may be quite liberal in his use of the material of decoration, grass and trees; may use it as his imagination may dictate, creating thereby abundance of pleasant shade and profitable grass and hay, and by the assistance of these, a comfortable home indeed. But what benefit does the intelligence of the community derive from his liberality in improvement? It has to be acknowledged that another tasteless man lives beneath the grove, which real enterprise and pluck have produced in a few

years. It is another evidence that artistic ideas, combined with sound judgment, did not molest another prominent citizen.

We can go from place to place in such a town or neighborhood and notice all the pleasing evidences of floral taste displayed by the ladies; we may be forced to commend the liberality of expenditure in improvements, we may admire the many elegant mansions of the leading men; but we have, nevertheless, to acknowledge that the community has no conception of simple rural taste, though many evidences of natural taste, possessed by individuals, may greet the eye.

How different is the impression made on the mind when visiting one of the many towns and widespread rural neighborhoods, where evidences of artistic ideas, pervading the improvements of the home grounds of the inhabitants, greet the eye on all sides, where thearring features of disproportion, existing between the remnants of the past and the things of the living present, are removed. The former primeval forest is here recognized by the stately groves, in harmony with the houses which rest in their genial shade, but happily the wild confusion of trees of all grades, so very characteristic of every accidental remnant of the woods, has vanished before the light of advancing culture. Glancing attentively over such a scene of art and utility combined, the eye will meet everywhere with distinct sylvan outlines, with proper relative proportion of component parts, with groves and lawns, making a pleasing balance of light and shade, conditions of scenic beauty which every intelligent member of the community, willing to give the principle of correct taste a serious thought, can readily understand and use rationally. "This is the meaning of 'Improvement.'"

APPLICATION ON THE PRAIRIE. Were it possible to compute the stupendous number of trees already planted and reared on the bleak and treeless plains of our country, one might but faintly realize the magnitude of the work of improvement performed by the unconquerable energy of this agricultural and horticultural nation. But viewing on the other hand the absolute necessity of protection from the excesses of the climate, the sternest necessity of powerful bar-

riers against the storms and sweeping winds, the economic demand for fuel and material of construction, the impartial observer has nevertheless to wonder at the insignificance of results thus far attained, when compared with the real wants, which stare the prairie people in the face. Compare the number of homesteads, of smiling prairie farms, enjoying the blessing which only shading groves and private forests are able to bestow, to that of farms and houses singly, or collectively associated in villages and towns deprived of these benefits, by neglect and apathy in this important branch of improvement, and let us wonder for a moment at the deceptive nature of false utility; at the disregard of the plainest demands of rational utility, and at the absence of true solid comfort from the unprotected prairie home. But happily the spell of ignorance or disregard of the true wants of the prairie home is nearly broken; a more enlightened horticultural day is dawning for the western states. The energy of the people in behalf of their best interests is fairly aroused. The pioneers in tree planting have done a noble work and their example is being imitated by the masses. The endless number of unprotected homes met to-day, will in a coming generation be a remembrance only of the past, replaced by homes enjoying all the benefits which the fertile soil and a higher mental culture is able to produce.

The intelligent farmer is acquainted with all the material benefits of the timber belt. He knows its influence on the real comfort of domestic life, as well as on the fruitfulness of the orchard and the widespread field. The most economic mode of planting and cultivating is generally understood, discussed and practiced. The belt, however, is planted in straight parallel lines, adopted for the sake of convenience of cultivation. It produces a wall of boughs and foliage, which serves the purposes of utility for which it is intended. Its scenic appearance, however, is stiff and unnatural; like any other row of trees planted by the hand of a tasteless man, it possesses only the minimum of sylvan beauty. A piece of ground thus protected looks as if fenced off, or barricaded from the outside world. It is a contradiction to the principle of scenic beauty. The section of the prairie country in which these

square sylvan walls surround the individual homesteads of the people appears, in consequence, as well supplied with the demands and improvements of utility, but neglected by the designing hand of rural art and progressive taste. Is there a practical plan within the easy reach of every farmer by which this difficulty can be reduced at least, if not entirely overcome, by which the sylvan barrier against the inclemencies of the climate can be made ornamental as well as highly useful? We answer, the way is a very plain and simple one. The straight line can easily be apparently wiped out by the addition of a clump or proportioned mass of trees planted here, and in front of it. The outline of the foliage becomes thereby a broken one, losing its indwelling principle of the hedge, and assuming the natural form and sylvan variety of the margin of the native forest. A belt planted with an irregular outline need not necessarily occupy more ground, nor require additional care or painstaking in cultivation, than the straight line. Its utility will be the same, but its scenic beauty, as seen from the outside of the place and by the outside world, will be greatly increased. It will be an evidence of an artistic idea combined with the demands of strict utility—a rational, progressive improvement.

Think of the magical change which might be effected in the aspects of the most flourishing districts of the prairie states in which the lines and squares of cottonwood trees and Lombardy poplars surrounding the many homesteads, greet the eye in all directions. Suppose these sylvan surroundings of the home were planted on the simple, natural plan, as continuous groves and thickets, diversified by clumps and single trees sprung up in connection therewith, here and there. How charming and forest-like would these homesteads be! How eloquently would they express the rational and refined rural taste of their inhabitants!

Ground, of whatever extent, devoted to the domestic purposes of the farm, be they those of the household or of the department of domestic animals, can be transformed from a treeless state of nature into a securely protected, pleasantly shaded and attractive sylvan scene; a true oasis of shade and comfort in the wilderness of light, of sunshine and of wind,

prevailing on the plain. Protecting and decorating trees are ever the first landmarks of the newly erected homestead of the settlers of the prairie. They are the material of civilization and of art. Why should they not be planted on every prairie farm? And why should the natural conditions under which they will produce the greatest degree of scenic beauty be ignored and counteracted where they are planted? This is a very simple question which has often been asked, yet a very important one, when viewed in the light of true, unprejudiced intelligence and reason. The answer would open a widely extended vista into the possibilities of the future.

The art to which we owe the parks and pleasure grounds of both continents whose footprints are visible in all the graceful suburbs of the cities, and in the endless chain of rural improvements stretching throughout the length and breadth of our country, offers its services likewise to the tree-planting prairie farmer, hoping to gain its greatest triumph yet on the western plains, where groves and forests are more sadly needed than anywhere in the wooded sections of the land. He is deeply interested in the question of how to supply the pressing demands of timber, fuel, shade and protection against the winds and storms. Some doubt the feasibility of a union of art and utility on so great a scale; forgetting, however, rationally to separate the two objective points of landscape gardening, of which one is the design and decoration of the ground, the other the creation of distinct sylvan features: the one is *ornamental gardening*, the other is practical and *artistic landscape planting*. The farmer is but little interested in the art of design, and of ornamental horticulture, by which the polished and enchanting pleasure grounds of wealth are made, but he is deeply concerned in forest planting. The artistic ideas of landscape gardening are not only reasonably admissible, but indispensably necessary in the formation of his plan of operation, if he desires to move in harmony with the laws of progression freely adopted in almost every department of domestic and public life. The question is not one of the designing art of gardening but of rational planting, in the results of which the present generation and its posterity are materially interested. It is a strife for independ-

ence from the casualties of surrounding nature: a fight in which the human family has long been engaged. The greater the degree of development of the resources of the plains, bringing in its train an almost magical increase of population, the sterner will be the demands of necessity; the louder will be the appeal to the intelligence of the people to devise the wisest and most feasible plan of supplying the missing elements of happiness and prosperity. Agricultural science and political economy are equally interested in the solution of this problem, which can only be based on nature's willingness to bring forth the missing, the sadly-needed trees, wherever the enterprise of human hands may indicate the spot on which they should grow when properly planted and cared for by that all-powerful agency.

The prairie farm is the ground on which the true mission of the art of landscape planting, not of gardening, will be demonstrated by the intelligence of an agricultural people, of owners of the fertile soil on which they live. The progress of development and dissemination of this art must be an entirely different one from that which has brought forth the famous rural parks of England and continental Europe, which naturally have no relation to any of the systems of American husbandry. But notwithstanding the wide difference existing between the people and the possessions of both continents, one rational lesson can be learned of the parks of Europe, which when fully comprehended will lead the inquirer directly into the secret of the cause, the effects of which he calls "scenic beauty." Making this cause the basis of his operations in tree-planting, he cannot fail to attain its legitimate results likewise, whereby the smiling prairies of the west would be electrified by a magic battery of sylvan beauty, of true western rural taste.

PUBLIC IMPROVEMENTS.

E. Pluribus Unum.

We have endeavored to draw a distinct line of separation between the natural results of each individual effort in the improvement of grounds. We have seen that one effect is the design and inside decoration of each individual piece of ground, improved, the other is the perspective view of the ground, of its buildings, and its trees, in which the community at large is principally interested.

The scenic aspects of a town, or of a section of country in which many people live, are in consequence in great measure dependent on, and shaped by the individual taste of the various owners of the real estate of the area, and for the same logical reason no locality can present a really tasteful appearance, pleasing and inviting to all, whose citizens are ignorant of the fundamental principles on which scenic beauty rests—and without which it cannot exist. A certain degree of artistic intelligence must, therefore, pervade the public mind, before the evidences of artistic ideas can greet the eye of the outside world. This intelligence is the governing power of all public improvements: in its absence a community is easily led astray. For this reason some men can palm themselves off as leaders and executors of rural taste, who would better be paid to stay at home and hold their peace.

THE PUBLIC STREETS. It is the universal custom to decorate the streets with shading trees, planted at certain distances along the line which separates the driveway from the sidewalk. This decoration and protection of the public thoroughfares, is in most cases a voluntary contribution of the owner of the property to the public welfare and to the scenic beauty of his town. The generality or scarcity of this evidence of intelligent enterprise is a true index of the spirit dwelling within the community and the visitor grades thereby, involuntarily his opinion of the people. A uniform volume of

pleasant shade, denotes a uniform distribution of intelligence and liberality of improvement; a broken line of shade trees speaks of the indifference and selfishness of the many citizens, who carelessly neglect or refuse this universal contribution to the public comfort. A beautifully shaded street, or town is, therefore, inviting to all minds, while its negative acts in the opposite direction. In some communities the prevailing spirit of enterprise forces all alike to comply with this public need; in others where no such animus exists the public good is considered an imaginary idea which no one is bound to respect. The decoration of public highways by befitting shade trees is thus a matter of far more importance than many conservative people are willing to believe. It expresses clearly the nature of the material which makes up the community.

The visitor will next view the fronts of the various grounds in which the houses stand. By their appearance he is enabled to guess at every owner's taste and correct judgment. The eye is occupied by two objective visions, the line which separates the property from the street, and prominent objects along it, in consequence closest to the eye. On a level site, as in most of the prairie towns, the surface of the street and of the inside of the ground has a nearly uniform height. The front fences can thus show no great variation in elevation. Their uniformity is pleasing to the eye as it expresses system and order, an indispensable attribute of every well regulated town. This rule of uniformity is quite frequently interrupted by a higher piece of ground, whose fence is set on the higher level, on a broken, neglected bank of ground. This very piece of ground, no matter how many very pretty things may be in its interior, is the marring feature of that block. Its owner has neglected to slope the front sufficiently to set the fence on a level with the sidewalk. Small as this difference of opinion in improvement may appear, it is nevertheless the cause of much discord in the appearance of the street. This case may serve as a type of the immense mischief done to the otherwise very pleasant view from many streets, where the front fences stand on the top of rough banks of clay. The plainest consideration of correct judgment would, if indulged

n, convince their owners of the negative of improvement and taste represented by their property.

In all towns built on uneven ground, these differences of elevation vary indefinitely and must often be overcome by strong retaining walls. An enlightened view to public improvement will prompt the owners to harmonize as far as possible these inequalities of the ground. An obstinate, independent action of one individual causes quite often serious damage to the appearance of the adjoining property. Passing mention may here be made of the source of unspeakable mischief done to very many towns by the adoption of the original design of the plat, made in former years in accordance with the stereotyped rules of rectangular engineering, but in utter disregard of the natural shape of the town site. Many such towns have gone through a useless process of cutting and filling, in other words, have been engineered to death. The sensible plans of many suburbs of larger cities and modern rural towns, designed in conformity with the ground on which they are to be built, are tokens of a return from antiquated, dogmatic ideas to the practical and artistic common sense of our day.

The tallest objects nearest to the sidewalk are next viewed by the eye and naturally compared with the relative proportion of all around. What are these objects? The answer is they are the unnumbered, crooked, leaning, deformed locust trees and other disproportioned, half decayed remnants of the original forest which stand along the front fence of so many places. These are the true factors of discord in the scenic appearance of innumerable tasteful towns, whose inhabitants would consider it almost a criminal act even to think, much less to speak openly, of the removal of some of the useless trees. Could many well-meaning people be but persuaded to consider calmly the simplest rules of relative proportion of things of the past and things of the present, a line of wholesome argument might be opened with them, by which the aspects of their town would be greatly improved. But as tastes will differ widely, the trees have to remain, and the town is deprived of an important touch of public improvement.

PUBLIC SQUARES. The improvement of the public squares reserved to public use, by a wise foresight to the future, in a majority of towns of the Western states, is generally a subject of much discussion and great diversity of opinion. A certain class of citizens consider this public ground nominally, a free play-ground for everybody, whilst in reality they have a practical view to utility, and do not wish to see their cows deprived of so pleasant a public walk and pasture. Another class, and happily in most cases the majority of the community, takes a more enlightened view and wishes to improve the square. The ground is thus fenced and a number of shade trees are planted, solely with a view that they should form in time a pleasant canopy of shade overhead. This is the condition in which we find most of the public squares of the Western towns. The question of improvement should be considered as indicated above, strictly as a question of the design of the ground and as one of the formation of the future perspective view, which the trees will present to the perpetual sight of the community, from all parts of the town. It is evident that this consideration is far more important than the little query how the walks and passage ways from one corner to the other should be designed.

A rational choice of the design of the ground plan depends on the size and location of the ground and on innumerable local circumstances and conveniences, and no general suggestions can be offered outside the recommendation of correct judgment in all matters of real convenience or absolute necessity, and in the reasonable demands of relative proportion of roadways and general area of the ground. In some cases the adoption of straight lines may be demanded by common sense. In others curved lines will find a very suitable application in which, however, one point should never be forgotten. A curved walk, no matter how prettily it may look, will always be disregarded in public grounds, if it is not likewise the most direct and convenient line from one important point to the other. The public will have the shortest way; and if not made by art the daily traffic will make it across the lawn. The simplest and most commodious plan of design is therefore always the best, since it has the natural advantage of being

easily kept in order ; and this is simply impossible when the roads are not convenient as well as ornamental. The construction of roadways is quite frequently deferred to a future day, and can be done at any time when the public is prepared to order the work to be done. The planting of trees, requiring years for their development, is by far the most important initial step of the improvement.

Citizens taking an interest in the general prosperity of their town can render an active service in the cause of the public square by studying and discussing the question how the perspective view should look ; what outlines the trees should present in the blue light of the sky, in which they will be seen in all directions. The folly of making one solid mass of shade of the whole area will be plain to every mind ; each will see, therefore, the corresponding folly likewise of planting a chance lot of trees all over the ground. "Where will the leading group of shade be most appropriate? Where should the clumps and groves of trees be planted?" will naturally be the first questions asked. The improvement will in this wise become a subject of public interest, and will assist in disseminating artistic ideas among people, who may have never looked at matters of tree-planting in that light. Public improvements whenever rationally conducted always attract the attention of the community and are a powerful lever for the elevation of correct taste. The most philanthropic citizen should for this reason take an active part in their design and management.

The choice of the spaces where trees are to grow is thus the first step in the improvement of the public ground. It is made in reference to the distinct perspective outlines of the trees, and as to a due balance of light or lawn and shade trees. Two indispensable conditions of a pleasing picture, clearness of outline and balance of light and shade, are thus secured. The next question to be decided is that of variety. Referring to what has been said on this subject, no one will feel tempted to fill the ground with elms and soft maples solely, as is so universally done. A certain reasonable variety of types of trees, distinct in habit and form and color of foliage, will be selected and procured, which will make up the sylvan beauty of the place. The trees will not be planted at such distance

as they may require in 10 or 20 years in the future, but a greater number than eventually needed will be procured and planted, by which each group appears in bold relief from the very first. As vegetation increases the weakest specimens can be removed from time to time. The surface of the ground can be smoothed, and stocked with a luxuriant stand of grass, and thus, in the very heart of a progressive town, a simple sylvan scene of nature is created, whose beauty and attraction will increase from year to year. Viewing the often sadly vexed question of improvement of public grounds from this rational basis, its successful solution is within the easy reach of any intelligent community; and placing the cause of public rural improvements on this natural ground, its popularity in all rural communities will be increased correspondingly.

The mode of fencing and protecting public grounds, deserves passing mention. There was a time when a high and showy enclosure was considered the most prominent ornament of a place. The same principle held true with the safety of the interior of houses. The windows of banks and business houses were, therefore, barricaded by tight shutters to keep the burglars out; but also to prevent the police from peeping to the inside when a thief had entered by the back door or the chimney. In like manner was it customary in the leading cities to surround the public squares with high and costly iron or wooden railings, which served during the night time as a safe hiding place for the vicious. The blessing which the little parks yielded in daytime was thereby greatly neutralized by vice at night, thus making the moral value of public places very problematic with many citizens. We have learned, however, that safety is not promoted by darkness in any form, but can only exist in the light. The unsightly, high enclosures of parks and public squares have, therefore, nearly altogether disappeared. In places where stock is not permitted to range at large and ruin everybody's property, the public squares are open, protected by the good sense of the people. Where cattle are allowed to roam, fences sufficiently high to keep them out are a stern necessity. Their height and importance should, however, never exceed the real need; should always be low enough to permit a full view over the ground. The same

principle of safety should be observed in regard to the shrubbery selected for planting. In public places open at all hours of the night no dense groups of shrubbery should ever be permitted; the sylvan decoration should consist solely of clean, stemmed trees, amidst which the ground can be seen from all directions. Public safety demands this sacrifice of horticultural variety and decoration.

THE COURT HOUSE SQUARE is under the control of three different dignitaries, the janitor, the county judges, and the supervising architect. The old axiom that an ounce of prevention is worth a pound of cure is literally true in this case. The fewer attempts at ornamentation of ground surrounding a stately public building, are made by these parties, the better will the good taste of the public be pleased. The approaches to the building from all sides should be direct and commodious, in harmony with the size of the building. No small, insignificant walks should ever be permitted, though very frequently such are seen. The plainest rule of relative proportion condemns all such modes of improvement. The shade trees should not be planted in orchard form, but should be united into distinct clumps, in which they will form a pleasing sylvan relief to the building. The grass plats should be smooth and neatly kept. In their maintenance and perfect trim the janitor can display an abundance of good taste, thus gaining the good will of the whole community.

THE GROUNDS OF STATE INSTITUTIONS surrounding in most cases the grandest works of the art of architecture which a state possesses—deserve assuredly a more liberal and artistic treatment than they receive in many instances. It is a humiliating thought to the truly progressive western mind to see evidences of crudeness in artistic conceptions in the improvement of the grounds of public institutions, which in the oldest, the most developed states of the union, would simply be a laughing stock. It is sad to see the natural primitive advantages wasted, sometimes really spoiled and counteracted, to observe planless and senseless tree planting, showing an utter disregard of the future; all solely for the reason that some one, happening to be in office wielding certain execu-

tives powers, should accidentally be ignorant of the simplest principles of the art of design and rational improvement of ground. How many elements of true development and progress of the younger states are thereby disregarded, deferred to the more enlightened days of the future, by which delay much valuable time and advantage are lost. The intellectual culture of the nation is not divided by certain sectional state lines; it pervades the leading minds alike, no matter in what part of the country they may reside. Why should the evidences of practical artistic culture be so flagrantly contrasted in certain parts? The simple answer to this question is found in the strange peculiarity of human nature, that a little knowledge is a dangerous thing. Its possessors fancy that they are on the very pinnacle of culture when once in office, while in reality they are only beginning to climb the ladder of true distinction. Men highly cultured in one direction, will thus suppose themselves to be equal to every branch of art; and thus the ground, which can most easily be improved by grass and trees gets generally the worst in the bargain between authority and genuine art.

PARKS, public grounds, designed for the recreation and pleasure of the population of large cities, living constantly between high piles of brick and mortar, are indispensable public improvements of all cities, claiming metropolitan rank and culture, and are demanded not only for the health and welfare of the people but also as an attraction and boon for the outside world. The first example set by New York, the metropolis of the country, in the creation of Central Park has found universal imitation by nearly all the leading cities of the country. Extensive systems of parks and connecting drives, the so-called boulevards, encircling a wide circumference of territory have been adopted by various cities of the east and west, some of which are proportioned to the financial condition of their respective communities, whilst others are exponents only of the extravagant pretensions of certain cities, which will require many years of the future to come to full realization. A discussion of this subject is entirely outside the object of these pages, as it would lead the reader to matters in which he is not interested and which might make

him acquainted with some of the secrets of municipal politics amidst which his ardor for the modest public improvements of his rural town might be materially checked.

Mention should, however, be made of the most powerful lever and promoter of all public improvement, which is systematic organization and intelligent co-operation. A few minds enlightened by correct rural taste, and endowed with natural energy required to impress others in the same direction, can do a great missionary work in every community, on the same basis on which progression in all departments of life is made. Progressive citizens are wont to discuss matters of public improvement in order to convince the multitude of the material benefits resulting from the same. Organizations for the encouragement of tree planting along the public streets are found in many wide-awake towns, by which the most satisfactory results are attained. This same promoting power might extend its usefulness in every live prairie town and cause groves and forests to spring forth from many grounds which are often begging for a rational use to be made of them. The pleasant villages sprung up on the plains, can readily and very cheaply be graced by public groves and little forests, whose genial shade would be most acceptable to all their sun and wind-afflicted inhabitants, and hints of invitation to the visiting stranger. Each prairie town should have its public groves, whereby not only the comforts of inhabitants, but also the scenic features of their whole locality would be greatly improved. Examples might be given to prove the magic influence exercised by a few far-seeing, public-spirited men, with whom intelligent communities are sometimes blessed. Will such not give this passing suggestion a serious thought and imagine for a moment what results might be secured by a timely, energetic action in so philanthropic a cause, by which their names would be handed down to coming generations, and blessed beneath the shady groves called into existence by their good will toward their fellow-men?

In some communities, however, the men are too busy talking, (another word would be more appropriate), and here true womanhood will show its pluck, and take the matter of

tree planting in hand—that is to say, force, or if need be, shame their busy husbands into action. Much of the comfort and decoration of the home ground is directly due to the exertions of the female portion of the family. Why should they not likewise help the good cause of public, sylvan improvements? Why should not the noble examples, which might in this connection be freely quoted, be multiplied, and be universally followed throughout the Western towns?

The ladies of many communities of southern cities surpass perhaps in executive energy their sisters of the north. The monuments erected by a patriotic impulse of love of native soil, owe in great measure their existence and tasteful sylvan surroundings directly to the determined business tact of the women, who undaunted by the indifference of the men, set energetically to work to make a full reality of a cherished project, without wasting years to talk about the subject. They are in consequence the leading advocates of the modern rural improvements of their charming towns and newly revived cities.

THE GROUNDS OF INSTITUTIONS OF EDUCATION.

“How beautiful they stand,
 Those temples of our Lord:
 The beauties of our native place,
 The bulwarks of our land.”

This stanza of a favorite hymn applies alike to the institutions of education and to the houses of public worship. Both are the true bulwarks of the land and nation, whose welfare and prosperity rest on the mental intelligence and moral virtue of its people. Each detail, however modest or insignificant it may appear, but which may be capable of serving and of assisting the cause of popular education, should be deemed of sufficient importance to be considered, and if found worthy of recognition in instruction, to be fostered by those in whose

hands are placed the mighty interests involved in the education of the most enlightened nation of mankind. The question may, therefore, appropriately be asked in this connection. Has the condition, the outward appearance of the ground surrounding an edifice of education, large or small, any rational connection with the training of the minds, going on in the interior? We have met the same query when considering matters of educated taste in their relation to the interior and exterior of the residence of the individual citizens; we meet here again on ground solely devoted to the education of the people. We have seen that evidences of cultured taste cannot exist where the rational relation of interior and exterior of the home is denied or disregarded; that the public is at a loss to know whether refined taste exists within, if not visible outside also. We have seen that wherever aesthetic culture is most general, its outward evidences are most general also, producing the most attractive and refined home districts. The exterior appearance of the edifice of education must therefore be, to a certain degree, an index of the spirit that dwells and governs within. The exterior is made up of the outward appearance of the building and the surrounding grounds. All know that the building represents only a certain amount of money expended in its erection and a certain degree of architectural skill possessed by the designer and builder. The educator can lay no claim to the credit of either. The surrounding grounds, however, are a direct test of his conceptions of the taste which governs all grades of educated society, amidst which his pupils are at home, and to which they return when their course of education is completed. The authority which governs the educational institution is in consequence correctly judged by the facilities which it furnishes to the process of education, administered by the various educators in its employ. In order to answer the above question, we have to view the true object of all school training. It is a two-fold one. A child is sent to school to learn two distinct things: to learn the letters and figures on which all knowledge is based, and to secure the discipline or compliance with certain rules, on which society rests and depends for its welfare. One is a process of filling

the mind with abstract knowledge of certain facts; the other is a process of drawing out, of convincing of certain mental powers, with which the individual mind is endowed. Here is the point where all the difference in certain modes of training, and in the result of the different systems comes in. Education is a process of filling in and of drawing out the faculties of the mind. The mind is filled with various branches taught in the school; it is trained and developed by the system of order, obedience and good behavior, governing the school. One process makes the scholar, the other forms the citizen. The neatness, cleanliness and decoration of whatever kind of the interior, lay the foundation of the cultured refined taste of society; the condition of the exterior of the school, be it neat or slovenly, lays the foundation of the outside, the rural taste of the people, which shapes the aspects of the country, which decorates the home, which builds the prosperous town and city. There is a real, a rational connection between the school ground and the mind of the pupil; its influence for good or evil can be seen by everyone willing to reason impartially on the subject. Could we compute the number of times the scholar passes through the school ground the year around, then we should know how many times his mind is impressed by what it sees for weal or woe to the public taste. Majestic oaks from little acorns grow; in like manner grow mighty influences from the sights seen daily in the school.

The yard of every schoolhouse of the land can have, at least as the minimum of culture, cleanliness and neatness, a condition on which much of the education of mankind depends. Each citizen elected as a school director or trustee, should be sworn into office on condition of his compliance with this fundamental demand of civilized society. Advancing one single step in rational improvement, it will be seen that a cleanly kept yard can very readily and cheaply be greatly improved in appearance by the addition of a group or two of befitting shade trees where they may be missing. Where the ground is naturally shaded by trees a judicious selection can be made between the really ornamental and useful ones, removing the deformed and useless ones. The natural grove receives thereby a touch of improvement which

distinguishes it forthwith from a wild, uncultivated product of nature: a constant lesson to scholars. We hear the flimsy excuse for the absence of all improvements from the school-house ground, that there is no use to set out trees, as the boys would tear them down, and they would be in the way of the play of the children! Trees will surely be in the way and will be overrun, when injudiciously planted. Common judgment, often absent in such cases, will readily determine where they are not in the way, where they should be planted, and as for the unruly disposition of the boys, they can readily be taught to respect every article of public improvement, as on this lesson depends much of the safety of our communities. A judicious system of improvement of the public grounds of school houses will have in consequence its many beneficial influences, not only on the youth but on the old, who have failed to imbibe good taste when young.

But let us look at the question from an artistic point of view. To do so we have to go to academies and colleges devoted to the higher education of the female sex. The edifices are mostly commanding buildings erected on beautiful and well chosen sites, in many cases shaded by majestic forest trees. The interior is elegantly furnished; culture and art and elegance are fairly enthroned therein. But what of the exterior, the ground seen constantly by the young ladies, on which they promenade and ramble in leisure hours? With the exception of a few highly honorable examples, the products of correct taste and good judgment combined, we find most of these grounds the warning evidences of contradiction of art knowledge and culture, of everything professed and taught inside the building. Some are wild, uncultivated, shabbily fenced pasture lots, the very eye-sores of their town, instead of being the beauties of their native place. In others, a vain attempt at ornamental gardening is painfully visible, denoting the crude horticultural ideas of some professor or other enlightened friend of the institution. The principal acknowledges that the grounds are not as they might be, and as they will be made when some one furnishes more money; but for the present the funds are short and all are needed inside for the mental culture of the fair pupils; and all this blind disregard

of the plainest axioms of rational taste which rules the present day, in the pretended name and interest of higher, of enlightened education of the female sex !

Now let us turn from such mistakes of practical education to one or the other of the honorable exceptions of the rule. We find ourselves on a well kept lawn, shaded by clumps of trees diversified by some groups of flowering shrubs, graced by a few pleasant beds of flowers. The roads and walks are drawn in graceful curves, they are smooth and well constructed, bordered by sharp and pleasing lines. There is no extravagance of expenditure visible anywhere ; all is plain, simple, beautiful and pleasing. We are invited to the inside. The rooms are well furnished and liberally decorated with specimens of art and æsthetic culture of the home. The outside grounds form a befitting foreground to the interior. Here is the home of harmony and of correct taste : here is an institution of true artistic and refined education. No wonder the pupils show, like true country girls, "grace in every motion, music in every step." None will leave this edifice of education without a well-learned, often studied lesson of correct rural taste, such as the enlightened spirit of our day should foster in the minds of those who in a few years will take an active station in the affairs of real life.

To consider the question from a point of view bearing directly on the general intellectual and scientific culture of the day, we have to face the grand temples of higher education, the normal schools, the colleges and universities, in which the flower of the youth of the country is trained. Science and learning in all departments of knowledge are here truly at home. The interior of the stately edifice is systematically sub-divided and utilized for the promulgation of knowledge. It contains the libraries of literature and the cabinets and laboratories of natural science, together with the philosophical and mathematical instruments, indispensable to the various courses of study. But is there any use made of the outside room allotted to these buildings ? Do the spacious grounds, quite often peculiarly favored by nature, bear any evidence of the volume of learning enthroned within the walls ? They answer the question themselves to the out-

side world ; they openly proclaim that they are considered, in the greatest majority of cases, as altogether disconnected with the purposes of education; that they are the outside space and nothing else ; that their appearance together with the impressions on the multitude of minds coming in constant contact with them, is deemed unimportant in the systems of education pursued in the interior.

But taking the outside ground as space proper, the question might be raised, might not this very space be utilized, be turned very profitably to educational purposes. A variety proportioned to the extent of the ground, of indigenous trees and shrubs, both ornamental and of economic use, might grow on this space of wasted ground, which would be a living book of botany and arboriculture, in which not only the students, but the community at large, would be greatly interested, and by which knowledge would be practically disseminated amongst the people. Taking one more step on this basis of improvement, we have the *arboretum* and the collection of useful and ornamental plants, botanically named and classified, which might fitly occupy the ground surrounding the magnificent edifices of higher education. This disposition made thereof would be a really scientific use, a progressive step in a practical horticultural direction, through which a species of knowledge would be imparted which is impossible to the lecture room of the interior. The outside lecture room is fully as important to both the school and to the public as the books, picture charts and the herbarium of scientific hay, jealously guarded in the inside. The botanical garden and the *arboretum* is an indispensable medium of instruction of every university school of forestry and agriculture of Europe, and is developed to some extent in all such institutions of the older world, but strangely missing in the programme of education in our country, where its beneficial influences are far more needed by the people than in Europe.

The forest trees of North America, to which the continent owes much of its picturesque beauty and wealth of resources, deserve far more liberal treatment at the hands of natural science, than is generally accorded to them. Many highly interesting specimens might be growing in the spacious college

grounds of the Western states, as evidences of practical science and correct taste. A practical knowledge of the nomenclature and characteristic distinctions of the forest trees, the most widely disseminated and indispensable materials of the industries, would by this means be founded in the popular mind, which should be more alive to the importance of preserving and perpetuating the noble American forest. But strange to say almost any imaginable curiosity kept in a jar or in a glass case of the cabinet, is far more interesting to the scientist and to the multitude than wonders of the vegetable world visible all around us. A good portion of the scientific literature of the day has withal no real and practical connection with the amelioration of human life, thus resembling a bright comet in endless space, which may be constantly watched, but whose course is in reality of no material interest to the dwellers on this terrestrial ball.

“Words are like leaves, and where they most abound
Much fruit of sense beneath, is seldom found.”

But viewing the subject in the plain light of ordinary improvement as adopted and practiced by all people of culture and taste, it will be freely conceded that a well designed and artistically improved piece of ground is a far more congruous foreground to the college than a wild and poorly outlined and carelessly planted patch of land; that it would educate the eye and mind in matters of rural taste; that it would impart practical lessons on progressive improvement in every home and neighborhood to which the student returns during vacation and after the years of college life are ended. His return from the halls of science would not only be celebrated by the learned and elegant orations which he may deliver to his friends and neighbors, but would make him a welcome leader of progressive rural improvements; a true country gentleman.

The landscape is the background of every walk and action of human life; its simple elements, grass and trees, surround the home and beautify the real scenes midst which we live. Why should the art which shapes the scenes of nature into

a picture most suited to the wants of the refined homestead, and most harmonious to the artistic ideas of our day, be unworthy of passing notice of the educators, and useless in the study of the educated? *Præcepta docent: exempla cogunt.*

The agricultural colleges of the country, founded by the endowment fund offered to the states by the national government, have wide-spread tracts of fertile land on which to experiment and to base the dictates of science in its relation to the culture of the soil. The mode of improvement of these estates is therefore a subject of great interest to the agricultural classes which expect to be directly benefited by this new departure in popular education. Their true object is practically to demonstrate what can be taken from the land and what can be put thereon to perpetuate its fruitfulness: to benefit, not merely the present tenant, but those to follow. This programme is a very wide and extensive one indeed, and is worked out in the different institutions in different directions, giving preference to the direct interests of the several states and sections of the country. The fundamental difference in the object, present production and future improvement should, however, never be lost sight of by those who conduct these experimental stations of agricultural science. Increase of production is not the only object of their mission, but the intelligence of the day demands of them the utterance of wise counsel, not merely in the cropping of the land, but also in the establishment of a rational system of rural improvements of the country. It demands that the culture of a day, not yet arrived but coming in the near future, should be anticipated and due preparation be made for its sure advent. Had this rational view to a future day of reckoning been steadily preserved, the development of these public farms of this nation would have been a different one from what it is to-day, and the day of a higher culture would not be so far off as it seems in reality to be.

A passing glance over two historic movements of the development of agencies by which the culture of our day has been produced, may suffice to indicate the direction in which a higher standard of culture amongst the agricultural masses

must be sought and labored for by unprejudiced leaders of popular intelligence. The foundation of our proud fabric of instruction was laid by a plain and simple ordinance issued by a few of the heroic pioneers of this nation, as follows: "*To the end that learning may not perish in the graves of our forefathers, be it ordained that a free school shall be maintained by every fifty families.*"

The results of this God-given legacy to posterity are visible everywhere in this American land, but not less apparent likewise are the evidences of neglect in compliance therewith. The intelligence of each individual, the culture of each community and state, is a proof of the wisdom of founding the free schools of our land: the rock on which the nation's welfare will forever rest: the base from which the thousands of institutions of higher education, those nurseries of our material and national glory, have arisen. A germ of inequality and of discord in consequence was hidden nevertheless in this fruitful soil of knowledge.

The institutions of higher education, modeled after their respective parent institutions of the older world, were unavoidably impregnated with many dogmas and prejudices of centuries of the past, and produced in consequence a learned class of thinkers, claiming by divine right, as it were, a station far above the masses of workers, modestly trained in the rudimentary branches of learning.

It is at the point where the second epoch of the evolution of mental and popular progress makes its appearance. Labor, the foundation of all production, whose all-governing ultimatum is wealth, in order to assume and to defend its legitimate social position, demands in tones of manly firmness its rights in education likewise, hoisting the flag of "*educated labor*" alongside the banner floating proudly over a learned and privileged minority of mankind. The foremost countries of Europe lead the battle for emancipation of the worker's mind, and America follows nobly, led on by various sturdy sons of the productive and fertile west. What else but victory could be the result of so just a conflict?

The schools of *agriculture* and of the *mechanical arts* of both continents are the eloquent evidences of the supremacy

of creative and material intelligence over abstract knowledge and rigid conservatism, those indispensable supports of human development, but stumbling blocks in the pathway of modern progression when controlling exclusively the shaping process of the mental training of the laboring masses. The claims of industrial education have fairly revolutionized the entire fabric of popular instruction in all material branches. In connection with the fundamental pillars of the world's knowledge, accumulated during many centuries and wisely preserved from the educational systems of the past, they have ushered us into the millenium of art and science in which we live, whose forms are necessarily strongest developed in the centers of population and of wealth, the cities of the land.

So long as art is looked upon by the utilitarian eyes of the agricultural masses as an indifferent appendix to human existence, and science is revered only as a guide to material gain in the barn-yard and the field, so long will the tillers of the soil remain but indirectly profited by the higher culture of this day; so long will they occupy a similar position to that of the ill-lettered masses in comparison with the learned classes, a line of demarkation, to remove which has long been the effort of true industrial education.

The higher grades of agricultural education, for the promotion of which the agricultural colleges of our land have been created in order to fulfill their real mission, are forced not merely to acknowledge the refining influence of art, but practically to foster and honestly to teach its most useful branches. Science, the universal gateway to increase in production, and to higher remuneration and profit of skill and labor, has given us an enlightened system of material agriculture crowned with the highest grades of domestic animals, with larger crops than in the past, and with unlimited plenty in the nation's wealth. The farmer shares in general with the rest of mankind the polishing influences of art; but why should this medium of a higher culture be slighted or ignored in his specific education? Would not his home and family circle thereby be directly elevated to a higher plane remoter from the clod of the earth and from the association with the surrounding animal world, aspiring to a standard of

refinement enjoyed at present only by the so-called educated classes? Rural art, practically materialized on the wide-spread tracts of land devoted to the higher training of the rural masses, will simultaneously achieve two important objects. It will offer the charms of scenic beauty to the homes of the agricultural masses by the magic force of its identity with smiling nature, and it will practically demonstrate to sister institutions of the highest grades of education, quite often looking down in derision on the colleges of the farmer, that even the centers of intellectual culture can learn a wholesome lesson, not only from scenic nature, but from the enlightened agriculture of this land. The consummation of these desirable and cultivating influences will hasten the advent of the future day, to which allusion has been made above.

THE BURYING GROUND.

“I am a stranger and a sojourner with you: give me a possession of a burying place with you, that I may bury my dead out of my sight.”

“The graphic language in which the twenty-third chapter of Genesis narrates Abraham’s purchase of a sepulcher from the sons of Heth, surpasses in simple pathos the most studied writings of modern days.” It is not only a proof that a respect for the dead was coeval with man’s first social institutions, but also one of deep solicitude of the feeling heart for the sacredness and the security of the resting place of the dead. Under this impulse the patriarch demands the possession of the land, paying therefor “four hundred shekels of silver, current money with the merchant.” Following the history of the patriarchs to the close of Genesis, we see it verified that there is society even in the grave, that there is a desire in the human heart that the body shall, in the grave, be dearest to those who were nearest to him in life. On his dying bed

the patriarch Jacob says to his children, "Bury me not in Egypt, but with my fathers in the cave of Macpelah, that is in the field of Ephron. There they buried Abraham and Sarah his wife; there they buried Isaac and Rebekah his wife; and there I buried Leah." And Joseph, when dying, "took an oath of the children of Israel, saying, God will surely visit you, and ye shall carry up my bones from hence."

This impulse of the human heart has been the same in all ages and amongst all nations. It is a gift of nature not one of education. The tomb, the truthful chronicler of the history of our race, proclaims not merely the standard of culture possessed by the nations of the past, but more so the deep respect paid to the departed, expressed by the evidences of art employed in the attempt to immortalize their virtues and

NOTE. The West points justly to Cincinnati, its queenly city, as the centre around which the earliest reminiscences of its marvelous development, material as well as intellectual, cluster; the stronghold of art and æsthetic culture even of to-day. The numerous exquisite ornamental grounds gracing the picturesque suburbs of that city were inspired by the loveliness and grandeur of the scenery of the romantic Ohio, and owe their existence to the refined taste of her wealthy citizens. No sooner had the Atlantic cities taken active steps in the creation of rural cemeteries than Cincinnati sprung boldly to the front rank of progressive improvement in that direction, assuming the leadership, not only in thought, but in executive art likewise. The social and artistic idea on which the modern burying ground is founded was expressed in eloquent words by one of Cincinnati's most honored citizens, the late Hon. Jno. McLean, on the occasion of consecrating the site of Spring Grove Cemetery to purposes of Christian burial. The application of the true principle of the art of landscape gardening, to grounds devoted to interment, was forcibly expressed and practically demonstrated by the late Adolphus Strauch, the talented artist to whose hands the design and improvement of Spring Grove had for many years been entrusted. The Reports of that cemetery express the enlightened ideas of those pioneers, and of many other eminent writers quoted by them. The subject of the following pages has been prepared by the writer under guidance of their writings in his possession, using in many instances the words chosen by them themselves. In doing so he has been guided by a desire to disseminate enlightened views of progressive, popular culture and refined taste in many circles of society in which the above mentioned printed Reports have thus far been unknown.

valors by the aid of the most imperishable materials of nature. The culture of the living is expressed by the mode of treatment of the last resting places of the dead. This axiom of civilization is firmly established by the history of mankind and verified in every instance, even in our day.

The burial ground expresses in truth the inward sentiments of the living. "It is a territory which in reality does not belong to this present sphere: it is neutral ground lying on the confines of eternity—it is inhabited by the dead—whose spirits live in that changeless state of existence which lies but a step from this solemn ground. It is also the field of tears and of many sorrows of the living."

Is this ground worthy of our attention, deserving of our efforts of decoration? How utterly repulsive is the sight of the innumerable neglected, wild and unprotected burying grounds met everywhere in this Christian land of ours! How cold and stoical must be the heart of that man who supposes that the body, being an insensible mass of matter, may be covered from his sight with little care or ceremony, and thought of no more! Who can see the grave of a beloved friend utterly neglected and overgrown by briars? The feeling heart regards the spot where the remains of the dearest ones were laid to rest, as sacred above all other places. The silent grave of the pioneer of civilization in the deep shade of the native forest was often decorated by some loving, trembling hand with the modest flower of the woods; the same impulse of human nature strews the tomb of the prince of fortune with all the tokens of affection that art and wealth can offer. America has produced the loveliest cemeteries the sun has ever shown upon; but it has likewise a graveyard scenery in certain sections which disgraces the spirit of the nineteenth century.

The acute taste and sound judgment of the enlightened citizen of this country have learned an important lesson from the passage of Holy Writ quoted above. The patriarch secured undisputed possession of the field of Ephron, and he purchased the field with all the trees thereon and in the borders round about. This indicates the fundamental principle of absolute security of possession, and of scenic rural beauty

of the tracts of land selected for the rural cemeteries which grace the environs of the leading American cities. It founds two indispensable conditions of the modern cemetery—security and rural beauty.

In the early days of the history of our land the houses of public worship had in their neighborhood, quite often in the same enclosure, the burying grounds of their respective flocks, and the municipal government furnished likewise burying facilities to the population at large. It was plainly seen that this system offered no security to the survivors of the departed; that the ground, when becoming valuable for other purposes, might at any day be pronounced a nuisance, with orders of removal of the remains. Church trustees were readily induced by offer of gold to accept the tangible gain and to do the same that the city authorities would gladly do, sell the last resting place of the former generation for building sites of the present. A plan had to be devised by which the temptation would be removed from the church and worldly rule, by which one generation would not savagely disturb the rest of death of a former, by which the sacred ground would be securely dedicated to the dead and *not to the living*. Civilization demands *a trust that shall endure until time shall be no longer*. This is the foundation on which the modern American cemetery rests, and which is wanting altogether to the burying grounds owned by the church of whatsoever creed, or by the municipal authority.

The plan adopted in the largest and most popular cemeteries of the country is one of association, of which each lot owner is a member entitled to a vote in the administration of the trust. The famous rural cemeteries of Boston, New York, Cincinnati, and of many other cities, are founded on this truly republican form of government. The leading cemeteries of Philadelphia and Chicago are owned by one or more individuals who sell the parcels of ground to the public in fee simple; the perpetual trust of individual possession is in consequence the same as in the other plan. The leading cemeteries of these cities have, by wise management, already accumulated a surplus fund which cannot fail to increase steadily, by which an interest fund will be created, which will

be more than sufficient to keep the ground perpetually in perfect order, after all burying lots have been sold.

Cannot this wise financial plan also be adopted in the rural districts, where people may desire to found a safe and cultivated resting place for the generations as they come and pass away? How strangely short-sighted it is to persist in a system and practice of burial which the primitive ideas of former generations adopted, in accordance with the peculiarities and privations of a new and sparsely settled county. Progressive intelligence demands that the customs and conceptions of the past be remodeled and made harmonious with the spirit of the present day, not only in the modes of life, but also in the modes of burial.

But what of the mode of decoration of the burial grounds which the inspired writer foreshadows clearly, by distinctly recording all "the trees thereon and in the borders round about?" This simple passage of the Bible has a deeper meaning than many of its readers may perhaps have observed before. The trees thereon and round about mean simply the sylvan decoration of the burying ground, which is by their aid made attractive and pleasant to the mind, and will thereby be frequently visited by the living, oftener at least than if it were bare and repulsive to the outward senses. Its moral influences on the living will, in consequence, be felt in a wider circumference, numerically speaking, and will be heightened by its association with simple, beautiful nature, through which the thoughts of the Creator—infinite clearness and beauty—are reflected into the docile soul. The grave with all its solemn thoughts and reflections, offered to the skeptic, the philosopher and christian, is the most powerful educator of the human family, but has likewise given rise to the superstitions which have in all ages prevailed amongst men. Advancing culture and intelligence has had a desperate, long continued struggle with the mysterious horrors of the tomb, and has succeeded in the course of time in freeing the grave from the symbols of fright which vanity had for centuries associated therewith.

The most ancient nations of which recorded history gives a reliable account, selected suitable places for general interment,

remote from the habitations of the living. The burial ground of the ancient Egyptians was situated beyond the lake of Acherusia, which signifies the last condition of man. "This cemetery was a large plain, surrounded by trees, and intersected by canals, to which was given the appellation *Elisioens*, meaning rest." Those only whose lives had been exemplary, were admitted to sepulture in that place; whilst those who had disgraced the true object of their lives were thrown into the loathsome pit called *Tartarus*, signifying the use to which it was destined. This gave rise to the Greek fables of the Lake *Acheron*, *Charon*, his boat, his ferry money and the *Elysian fields*. It was a belief of the Egyptians that after a period of three thousand years the bodies of the departed would again be animated: hence the endeavor to preserve, till the arrival of that period, the mortal coil of friends and relatives. The ancient rock tombs of Egypt contain to this day the remains of many who lived in the days of *Moses*.

The ancient Germans buried their dead in groves consecrated by their priests. The majestic grandeur of these sylvan temples may have given the first inspiration of the Gothic style of architecture. The Romans, in the earliest times, buried their dead in public places. In the flourishing days of the Republic they burned the dead bodies and laid the ashes in an urn. After the introduction of Christianity, chapels, shrines and altars were erected over the dead, by which the universal custom of the Christian churchyard was suggested and inaugurated. The first encroachment on the sacredness of the temple of worship was made in favor of the Emperor *Constantine the Great*, who was buried in the outer porch of the church of the *Apostles* in *Constantinople*. This first example has been the precedent to a continued struggle by which the claims of wealth and rank and power secured a sanctified sepulture beneath the domes of the Christian religion, and by this sad practice the churches of Europe have become true charnel houses of the dead. The sacred grottoes filled with dead saints found beneath the historical temples of worship of the leading countries of Europe, speak eloquently of the power and evil consequences of one example of human vanity and superstition.

This entire fabric was, however, shaken to its lowest foundations by the French Revolution of 1789. A decree of the national assembly in 1790 prohibited the dangerous custom of burial in churches, and ordered the formation of cemeteries at a distance from the dwellings of the living. Paris, the great capital of the world, produced in this wise the first cemetery of modern times, founded on the rational basis of equality in death. The *Cimetiere du Pere de la Chaise*, lying on the eastern limits of that city, was consecrated in 1804 as a burial place. Individuals, the most dissimilar in faith, in feeling and in practice, rest here in the peace of the sepulchre. We owe to this cemetery not only the inspiration of our American modern rural cities of the dead, but also much of the ridiculous superstitions and puerile features of a majority of the burying grounds of both continents. It is a perpetual sermon on the genius, the virtues and vices of all nations, more powerful than human oratory could possibly preach to mankind.

The cemeteries of Mount Auburn of Boston, Greenwood of New York, and Laurel Hill of Philadelphia, were founded in the decade beginning with 1830; the famous cemetery of Spring Grove of Cincinnati, and others in the vicinity of noted cities shortly afterward. The noble examples of the eastern cities were readily accepted by the people. So universally is this demand of civilization conceded in all the cities of the country, that beautiful rural cities of the dead are found to-day in the vicinity of all towns and cities where people of aesthetic taste and culture live.

The selection of the tracts destined for purposes of interment of the population is made with due regard to the necessary distance, not only from the dwellings of the living, but also from the annoyance which the smoke and turbulence and the noise of the cities of commerce and industry occasion to the visitors to the city of the silent. A picturesque situation, with an agreeably diversified surface, combining the most striking features of landscape beauty, and a porous subsoil, most suitable to burying purposes, has in all cases been selected, making the rural cemeteries of America truly the loveliest spots of the country; the most befitting foreground to the beautiful shore "beyond the river."

The first stadium of art employed in the design and decoration of the modern rural cemetery, was a crude and primitive idea when compared with the advances which correct taste has made in the space of fifty years, which have passed since the inauguration of the first enterprises of the eastern cities. The fundamental, all-prevailing idea of the former churchyard was the protection of the grave; security from the defiling touch of human feet and rude hands. Each grave was in consequence surrounded by an enclosure which was mistaken for real decoration. Costly enclosures of wood, iron or stone, or consisting of impenetrable live hedges, were introduced likewise in the modern cemetery, and were maintained by the public in many instances with great obstinacy, urged to this course principally by the trades which furnished the cut stones and the iron chains and railings. The process of freeing the popular mind from this species of superstition and adherence to the ideas of the past, was truly a tedious and a laborious one.

The first true example of a real park cemetery, unmarred by enclosures around the individual family lots, was furnished in the improvement of the newer portion of Spring Grove Cemetery of Cincinnati, under the guidance of its talented landscape engineer, the late Adolphus Strauch, whose name will be handed down to future time as the most honored in the history of rural cemeteries of America. The beauty and economy of the natural plan was in this example so fully demonstrated that it could not fail to find universal recognition and imitation in the cemeteries of other cities. Those of later date, various of which promise to become in the course of years, the finest and most attractive park cemeteries of the country, were based from their first inauguration on the natural or landscape plan, and have in consequence not to contend with the many obstacles of the older ones, in which the obstinacy of lot owners must be conquered by wear and tear of time and argument.

The modern cemetery is identical in design and sylvan scenery with the park, and is thereby distinctly contrasted with the stereotyped plan of the usual graveyard, resembling generally a yard of monuments and marble slabs for sale. The area of

the lawn is subdivided into parcels of various extent to suit the public. Each family burying lot has its central family monument, around which the members are laid to rest, as Providence decrees their arrival in the city of the dead. All useless stone work, such as marble slabs, copings around the graves and insignificant attempts at small monuments are carefully avoided. The corners of each lot are indicated by numbered stones only a few inches above the sod. The whole area is thus an uninterrupted verdant lawn, on which the graves are imbedded in the simplest and most natural mode.

The fundamental idea of the park cemetery is a rational return to the simplicity of nature, which is infinite beauty and speaks more eloquently to the soul than any possible device or cunning of art can do. It is likewise the most economic mode of improvement, and can most easily and cheaply be kept in perfect trim and order. Let anyone imagine the doleful sight of the decaying, unpainted, tumbling enclosures of the ordinary graveyard, or recollect the wild, over-grown hedges surrounding lots, filled up with bushes and weeds, that he may judge correctly of the most rationally suitable mode of design and decoration of the places of interment, which we may shun and disregard in busy life, but to which all must be borne in their own appointed time. The tomb, in former ages the symbol of fright and terror, is placed by art and culture in the most sweetly smiling spots of mother earth, and speaks in its embrace of simple nature in soothing lisps of love and hope to the soul, reminding it of its origin and final destiny—the presence of the Creator. The modern rural cemetery, as designed, improved and maintained by the modest art of landscape gardening, is a true fulfilment of the passage of Holy Writ, which says: "The Lord God planted a garden, and there he put the man whom he had formed." It is the most eloquent exponent of true American culture, the most shining landmark of the enlightened taste of the century.

The improvement of the grounds of interment of a community claiming culture and refinement is by no means a mere question of individual taste displayed in planting either trees or flowers; it is a stern question of civilization, in

which the rural population is interested as much as that of the cities of the land. To advance the usual excuse of difference in wealth existing between both sections would surely be entirely idle. A spot of ground restored by human hands to primitive simple purity by being decked with a garment of verdure, shaded by a few befitting trees, and protected from the interference of the outside world by a suitable enclosure, is the simplest type of a christian burying ground, harmonious to the dictates of the taste and refinement of our day. It is the fundamental basis likewise on which the beauty of the most elaborate modern cemetery of the wealthiest city rests. This simple mode of decoration is within the easy reach of every community of the country; it can be applied on any scale, and under any combination of controlling circumstances. It is the type of beauty in scenic nature visible everywhere and enjoyed by every one. A general adoption of this simple mode of decoration of the fields devoted to the peaceful rest of the departed would transform the sadly neglected and ghastly graveyards of the land into scenes of simple beauty, attractive and instructive to all minds. The graves of those who were dearest in life to many, would be oftener visited by the living, and the gentle voices coming from them, reaching the heart with greater power and effect than human speech can impart, would be heard more frequently.

The graves of the loved ones lost are the most eloquent teachers of the living. Are they worth decorating, worthy the attention of an enlightened, refined, christian people?

“ Why should the memories of the dead
 Be ever those of gloom and sadness?—
 Why should their dwellings not be made
 Mid scenes of light, and life, and gladness?
 Here let the young and gay repair,
 And in this scene of light and beauty,
 Gather from Earth, and Sky, and Air,
 Lessons of Life, and Love, and Duty !”

—CIST.

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