National Society
OF THE
Fine Arts

REPORT
OF
SPECIAL COMMITTEE
ON THE
Preservation of Rock Creek Valley as a Public Park
At an informal meeting of members of the National Society of Fine Arts, held December 9, 1906, at the residence of Mrs. Alice P. Barney, 2306 Massachusetts Avenue, it was decided to suggest to the Council of the Society that it appoint a sub-committee of the Civic Art Committee to be called the "Rock Creek Valley Preservation Committee." The Council adopted the suggestion and appointed the following gentlemen to serve on said sub-committee, with power to add to their number:

Mr. Charles M. Ffoulke, Chairman.
Dr. Charles W. Needham, First Vice-Chairman.
Mrs. Alice P. Barney, Second Vice-Chairman.
Mr. Glenn Brown, Secretary.

A special committee consisting of the following gentlemen was appointed to prepare a paper upon the preservation of the Rock Creek valley as a public park:

Mr. Charles M. Ffoulke, Chairman.
Mr. Hennen Jennings.
Mr. J. C. Hornblower.
Mr. Walter Page.
Mr. Glenn Brown.

This special committee submits the following report:
SOME REASONS FOR THE PRESERVATION OF ROCK CREEK VALLEY AS A PUBLIC PARK.

REPORT OF SPECIAL COMMITTEE.

Your committee begs to state that in its judgment the proposed tunneling and filling of Rock Creek Valley will cost much more than the amount necessary to purchase the creek and adjacent lands, remove the debris, construct a winding drive along the creek, and lay out and properly improve the banks as proposed by the Park Commission.

This Commission consisted of Daniel H. Burnham, Charles F. McKim, Augustus St. Gaudens and Frederick Law Olmstead, Jr., who ably and clearly support their plan in their report on the park system of the District of Columbia. Appendix D to this report, which we print in full on the following pages, discusses in a concise and able way, first, a large covered masonry culvert in connection with a boulevard; and, second, the open channel of the creek, the improvement of its banks, the construction of the roads and the spanning of the valley by bridges, and closes with the following significant statement:

"It is our conclusion that the Rock Creek Park should be treated as an open valley crossed as often as may be necessary by handsome and substantial bridges, flanked by traffic roads connecting on a level with the adjacent city streets and including at a lower level near the stream, a drive or drives and such paths as may be needed."

The cost data in Appendix D is taken from a report by Captain, now Colonel W. T. Rossell, former Engineer Commissioner of the District of Columbia, and his assistants. His report will be found in the "Report of the Operations of the Engineer Department of the Dis-
trict of Columbia for 1893," beginning page 238, and extracts therefrom to which we call special attention, are printed in the following pages.

No special appropriation was made to gather information for this report, so the work was done by the regular engineer force of the District of Columbia at such times as they could spare from their routine duties. Under the circumstances it was most creditably done and forms an excellent basis for further investigation.

The plan and estimates of Colonel Rossell were made, it must be remembered, prior to the initiation of the Park system of 1902.

His estimate for the tunneling and filling plan calls for an expenditure of nearly ten millions of dollars, which would have to be met by the Government unless the Government went into the business of selling the condemned lands in competition with owners and dealers of real estate in the city in order to defray part of the expenses. It is not probable the condemned lands would prove of any value for building purposes until after the construction work was finished, and the character of such filled ground would not justify buildings of value being placed upon it for a long time.

In view of the fact that the data on which these reports are based is of a tentative nature, it seems to us that it would be wise for the Government, even on engineering and utilitarian grounds, and before radical steps are taken for the filling up of the valley of Rock Creek, to make an investigation de novo, and that an invitation be extended to the Park Commission again to express its views on account of altered conditions.

To all observant people who have seen this valley, it is clearly apparent that to improve it without destroying its natural features will add materially to the attractions of the city and form a beautiful and convenient means of
communication between the Potomac Park and the parks to the north and make of them one continuous system. Those who recall the beauties of the Seine at Paris on a grand scale, and the beauties of the Leith at Edinburg, and of the little stream at Pittsburg on a smaller scale, will fully realize that maintaining Rock Creek Valley as a public park will add greatly to the charms of Washington. The National Society of the Fine Arts is preparing lantern slides of the Leith and the Pittsburg creek for exhibition to its members and to the public, so that those who have not seen either waterway can recognize how greatly they add to the attractiveness of their respective cities.

Your Committee understand that a number of Georgetown people believe that the value of their property is kept down by the present uninviting connections with Washington and that values will rise when the valley is filled. To all who are of this belief we predict disappointment because the proposed connections will be less inviting than the existing ones, as it is natural that only inferior houses will be built upon the new made ground, whereas, if the valley is preserved and is spanned by graceful bridges, values would advance because the two sections would be united in a beautiful manner, as are the two sections of Paris, Edinburg and other European cities.

Your Committee desire to impress upon the minds of the citizens of Washington and Georgetown that parks are the "lungs of a city" and afford children a daily opportunity of breathing fresh, pure air, and are in consequence of incalculable benefit in the preservation of the children's health.

The main reasons for the preservation of the Rock Creek Valley are succinctly embodied in the following resolutions adopted at a meeting of a number of the
residents of Washington and Georgetown on the 25th of May, 1906:

"First. That it is unwise to prosecute work which will deprive the District of any portion of this valley from park to river by filling, by diverting, or by covering in the waters of the creek.

"Second. As there is no park in the portion of the District west of Dupont Circle, it is desirable to keep this portion of the valley open for the purpose of a park.

"Third. Such a park will add to the beauty and attractiveness of the adjoining neighborhood, and it will add to the healthfulness of the community by furnishing a channel for the circulation of air, prevent the spread of disease, and act as a zone of safety in case of conflagration beginning on either side.

"Fourth. On the other hand, the treatment by filling will create a large area which will not be immediately suitable for building operations, and will, in all probability, be occupied by speculative buildings of an inferior character, decreasing the value of the surrounding property, and increasing the danger from fire.

"Fifth. The argument that the valley separates the two portions of the community and decreases the value of property in Georgetown is fallacious. The filling will not increase property values. What is needed to bring the two communities into closer contact are more and better bridges. A bridge at Q Street and one at N Street would accomplish this result.

"Sixth. It is not intended to antagonize the acquisition of any other tracts for park purposes, but it is believed that it is of first importance to acquire the borders of all the watercourses within the District.

"Seventh. The carrying of Rock Creek by culvert through this section will be, if consummated, the first deviation from the carefully studied plan of the Senate
Park Commission, who were acknowledged experts, and we feel that this deviation from this plan would be most unfortunate in the future development of the city."

The delegates of the American Institute of Architects, representative men selected by their chapters from all sections of the United States, interested and intelligent in landscape art and architecture, discussed the subject of the preservation of Rock Creek Valley as a public park at the Annual Convention held January 9, 1907, and passed the following resolutions:

"Whereas, it is proposed to make a culvert to conduct the waters of Rock Creek from Massachusetts Avenue to the river preparatory to filling the valley of Rock Creek, and,

"Whereas, this is a beautiful valley, peculiarly adapted for use as a park, and,

"Whereas, this valley is the natural link between the Mall and Rock Creek Park, and its preservation is one of the important elements in the Park Commission's plan, and,

"Whereas, this valley is needed for health and beauty and to complete the logical development of Washington City; therefore, be it

"Resolved, That the American Institute of Architects heartily approves the action of the National Society of the Fine Arts in advocating the retention and beautification of Rock Creek Valley, making it the connecting link between the Mall and upper Rock Creek Park. The Institute considers this most important to the beauty and systematic development of the city of Washington."

Charles M. Ffoulke,
Hennen Jennings,
J. C. Hornblower,
Walter Page,
Glenn Brown,

Special Committee.
APPENDIX D.


"First. To build a large covered masonry culvert or sewer for the creek, and to fill around and over this structure so as to obliterate the valley and raise it to the level of the adjacent lands; constructing a parkway or boulevard upon a portion of the filled land and subdividing the remainder into streets and lots for sale.

"Second. To improve the present open channel of the creek, regrade its banks, and improve them for park purposes, and to construct roads and paths within the park thus formed, spanning the valley by frequent street bridges to provide close connection with Georgetown.

"The arguments for and against each of these plans may be divided into considerations of expense and considerations of direct benefit to the community.

"As the question of cost is merely comparative we need not discuss those items which would be substantially the same in either case. The most important of these are the cost of land taken, the cost of intercepting sewers, and the cost of roads and other surface features of the parkway.

"The great expense of the first plan lies in the covered waterway, which is estimated in Captain Rossell's report at $2,358,925, and the filling and grading at $1,752,424, amounting, with proportion-
ate contingencies of $411,134, to a total of $4,522,483.

"The corresponding expenses under the open-valley plan have been approximately estimated at $100,000 for the improvement of the channel, $230,000 for excavation and grading, and $200,000 for retaining walls, etc., amounting, with $53,000 contingencies, to a total of $583,000.

"To these preliminary expenses must be added, in the case of the second plan, the cost of building additional bridges across the valley and renewing some of the existing bridges, which, according to their number and character, might amount to from $1,000,000 to $1,500,000, to be expended from time to time as occasion may demand, while from the cost of the first plan is to be deducted the net salable value of the land not occupied by streets and parkways, amounting to about 1,160,000 feet. While any estimate of this salable value can be little more than a guess, we may accept as a basis the estimates given in Captain Rossell’s report, taking as the minimum 86 cents and as the maximum $2.58 per foot.

"This would give maximum gross returns of $2,992,800, and minimum gross returns of $997,600; or, after deducting the cost of necessary streets, $130,000, net gross returns not less than $870,000 nor more than $2,860,000.

"From the above figures it would appear that under favorable circumstances the profit on land sales under the first plan might make its total cost some $400,000 less than that of the second plan, but that otherwise its cost might exceed that of the second plan by some $2,000,000.

"This is not, however, quite a sound comparison, because, on account of the magnitude of the work
and the length of time required for the settlement of the enormous fill under the first plan, it would be not less than fifteen and probably twenty years from the beginning of the work before the land or the boulevard would become available for use, while the less costly second plan would be completed within five years. The interest charges, at 2 per cent, on the sums invested in land holdings and in construction under the second plan, would be nearly $400,000; but under the first plan during fifteen years they would amount to over $2,000,000, and should they run for five years more, would amount to more than three and a quarter millions.

"It is evident, after all due allowance is made for the imperfect data upon which the comparison is based, that the first plan would under any circumstances be far more costly than the second plan with its open valley.

"The parkway provided under either plan would be in itself agreeable and dignified. Under the first, or culvert plan, there would be a broad, central roadway, flanked by four rows of trees in turf parkings, with promenades. Outside of these parkings would be wide streets for house frontage and for traffic, with the usual sidewalks and narrow parkings. The grades would be easy, the alignment agreeable, and the general effect, regardless of the quality of the abutting private property, would be similar to that of many of the notable boulevards of European capitals. But it is impossible so to disregard the appearance of the surrounding and inclosing buildings, for in boulevards of this formal urban type it is the buildings that fix the character, while the trees are merely a decorative adjunct.

"The portion of Georgetown and Washington
through which the line passes is now given over partly to manufacturing and partly to a poor class of residences. It is very far from agreeable in appearance, and it is hardly to be expected that it will become a first-class part of the city, because natural growth exerts no pressure in that direction. The tide of development can often be deflected by park and street improvements, but it can very seldom be reversed. A parkway, therefore, built according to the first plan would probably be lined by factories, tenement houses and the like, on a level with the drive and separated from it only by the width of a street and four rows of tree trunks. A formal urban boulevard is very dignified, impressive and interesting when it presents an agreeable aspect of city life, but when it presents a disagreeable aspect of city life and remains, as it must, just as intimately a part of that life it ceases to be satisfactory.

"Under the second or open valley plan the broad main drive accompanied by paths would run along a little above the creek, somewhat as does the new drive through Rock Creek Park. The present valley, which has been narrowed by the constant dumping of earth over its edge, would be widened by excavation at the restricted points to a semblance of its original form and clothed with turf and trees, while the necessary provision for business traffic and for building frontage would be made by border roads on a level with the existing streets. Along these border roads the same factories, tenements, and the like would doubtless be built as in the other case, but with the traffic roadways from 30 to 40 feet above the park drive such occupation would not intrude itself forcibly upon the attention, even if it were not entirely cut off from view."
"Besides excluding the parkway from direct and intimate association with an unattractive part of the city, the higher elevation of the regular streets would permit them to cross the parkway above grade by bridges spanning the valley, so that the busy and growing traffic of pedestrians, wagons, carriages, and especially electric cars would not be brought into conflict with the pleasure travel. From every point of view this is to be desired. For the driver of a spirited horse, for the wheelman, even for one strolling afoot along the parkway, the necessity for crossing a busy thoroughfare at every block, together with several electric-car lines, would seriously mar the ease and comfort of a pleasure excursion, while the obstruction to business traffic by grade crossings of a thronged parkway is not to be ignored. In the city of Boston recently the objections to a long diagonal crossing of a traffic street with the principal parkway were felt to be so great that the city went to a large expense to provide a second street for traffic and electric cars, less direct, but passing under the park drive.

"An advantage of the street-level boulevard that would offset, at least in part, the obstruction which it might offer to cross traffic, is that it would permit more connecting streets across the valley than would be reasonable or feasible with the open valley plan, where each cross street would have to be carried on a bridge. But with half the streets carried across on bridges, as is perfectly feasible, the interference of the valley with cross-town travel would be very slight. It is not a question of a uniform tide of travel from one side of the valley to the other; it is a question of travel between various regions somewhat remote on either side—travel which naturally
tends into a few main arteries. If the valley were converted into a uniform plain the bulk of the travel would still continue to flow on a few principal lines, and if these be well provided for by bridges the absence of a few intermediate crossings will be of little consequence.

"Objection has been made to a valley parkway secluded in any degree from the streets by difference in level—particularly if the seclusion be increased by trees and bushes—on the ground that it would be very difficult to police in such a region as that bordering upon Lower Rock Creek. This raises a problem not to be lightly pushed aside; but if carried to its logical conclusion, it means that we are to have in the poorer quarters of the city no parks in the least degree retired from the streets or materially differing in treatment from their bald and sordid surroundings; for any park is more liable to abuse than is a street. The answer to the objection is that we can not have good things in this world without paying for them and that part of the price of parks is the policing of them. The attempt to secure the policing of parks as a mere incident of street policing it not a wise policy and must in any large city give way to a regular and systematic policing of the parks. Moreover, in this particular case the difficulty may easily be exaggerated, for the fact that the sides of the valley cut off the sight of adjacent streets and houses from the main drive and paths does not necessarily mean that the valley itself is to be filled with dense thickets and somber groves. It may, indeed, be open and sunny, with but enough trees to give desirable shade.

"It would appear, then, that the open-valley project would afford the more satisfactory parkway and that its cost would certainly be much less than
that of the culvert plan; but there are still other points to be taken into consideration, of which the most important is, perhaps, that the culvert plan would add a considerable area to the building land of the city, from which in time a large income would be derived in taxes. The same argument may be raised against the withdrawal of any park land from commercial occupancy, and it is merely a question whether in this case the value of the park-like borders to the drive and its partial seclusion from disagreeable surroundings would be worth the loss in taxes. In our opinion it would be, especially when it is considered that the potential purchasers of this land are not likely to be lost to the District as taxpayers, but will simply purchase other private land, increasing its value by improvements and paying the same taxes upon it. This raises the question, too, whether it is a wise policy and in accordance with our principles of government for the public authorities to go into real estate business in competition with the citizens. There appears to be at present no lack of land for sale in Washington, but rather a lack of sufficient market, and for the Government to put additional land upon that market would seem a questionable blessing. If the Government is not to go heavily into real estate speculation in competition with the landowners of the District, the cost of the culvert project becomes so enormous as to be utterly out of the question.

"It is our conclusion, then, that the Rock Creek parkway should be treated as an open valley, crossed as often as may be necessary by handsome and substantial bridges, flanked by traffic roads connecting on a level with the adjacent city streets, and including at a lower level near the stream a drive or drives and such paths as may be needed."

"The measurements of the land to be acquired by condemnation, together with cost of same and of grading, with the price that might be expected for the land after the completion, has been reported on by my assistant, Capt. G. J. Fiebeger, Corps of Engineers, U. S. Army, whose report is appended. This report has been carefully prepared, and is approved by me.

"What will be the condemned value of any piece of land it is impossible to say, and I only attempt to make a very rough approximation. To say what will be the selling value of the land after the improvement is also a matter of speculation, but I believe above Pennsylvania Avenue that double the condemnation value is conservative. I therefore submit the following estimates, for the details of which I refer to the reports of my assistants:

"Converting Rock Creek into a Covered Sewer and Filling Between Banks.

APPENDIX E.

From the north line of Massachusetts Avenue to the Potomac river:

Cost of covered waterway................. $2,990,412
Sewer extensions ........................  51,500
Damages to Chesapeake and Ohio Canal. 150,000
Condemnation value of land............  4,112,545
Filling and grading .......................... 2,083,324
Contingencies ................................ 512,523

Total cost .................................... $9,900,304
Selling value of land ......................... 5,496,203

Net cost ....................................... $4,404,101

From Massachusetts avenue to Pennsylvania avenue:

Cost of covered waterway .................... $2,358,925
Sewer extensions ............................  51,500
Condemnation value of land ................. 3,562,615
Filling and grading .......................... 1,752,424
Contingencies .................................  416,284

Total cost .................................... $8,141,748
Total cost, carried forward .................. 8,141,748
Selling value of land ........................ 4,957,056

Net cost ....................................... $3,184,692

From Lyon's mill to Pennsylvania avenue:

Cost of covered waterway .................... $1,473,950
Sewer extensions ............................  51,500
Condemnation value of land ................. 1,917,864
Filling and grading ..........................  880,670
Contingencies .................................  240,612

Total cost .................................... $4,564,506
Selling value of land ........................ 2,908,768

Net cost ....................................... $1,655,738
From the intersection of Twenty-fifth and O Streets to Twenty-fifth Street extended:

<table>
<thead>
<tr>
<th>Description</th>
<th>Cost</th>
</tr>
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<tbody>
<tr>
<td>Cost of covered waterway</td>
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<tr>
<td>Sewer extensions</td>
<td>49,500</td>
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<td>Condemnation value of land</td>
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<td>Filling and grading</td>
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<tr>
<td><strong>Net cost</strong></td>
<td><strong>$615,746</strong></td>
</tr>
</tbody>
</table>

"In connection with the cost of this work I would state that the claims of the Chesapeake and Ohio Canal Company to the portion of the abutting land south of Pennsylvania avenue, and extending even along the bank of the Potomac River, are very large, both as to value of wharf property and of the accretion of land. The values of wharf properties belonging to other parties are also very uncertain, and I have not attempted in this report to make any estimate as to the probable cost of these to the United States, because I believe it to be an impossibility.

"Though not required by the resolution, I have given the cost of this work between the different limits so that full information on the subject might be had. It will be noticed that the largest item in each estimate is the condemnation value of the land; it is also the most uncertain one. No allowance has been made for interest on sums expended from the time of each expenditure to the time when the reclaimed land will be sold. This time will be long, and will add materially to the cost."
“In closing I will only add a few words as to the advantages to the District of this work. As a means of a sewage disposal it would be wrong in principle and enormously expensive. But, until works for the proper disposal of the sewage can be built, Rock Creek must carry sewage. It is greatly to be hoped that this time may be short. To reduce the unsanitary conditions promptly the canal company should be required to open the gates at the mouth of the creek every night and the creek should be flushed.

“From a sanitary standpoint I can see no necessity for covering the creek at all if the sewage is kept out of it.

“This improvement, reclaiming a large body of land between Washington and Georgetown and making them one, will increase the revenues of the District of Columbia by the increased taxation, and will add to the beauty of the city. The bridges can also be omitted at K, M, and P Streets, and Pennsylvania Avenue.”

Very respectfully,

Wm. T. T. Rossell,
Captain, Corps of Engineers,
U. S. Army, Engineer Commissioner, District of Columbia.

Hon. L. P. Morton,
Vice-President, Presiding Officer, U. S. Senate.
EXTRACTS FROM CAPTAIN FIEBEGER’S REPORT, PAGES 241 AND 242.

DESCRIPTION OF THE IMPROVEMENT.

“South of Pennsylvania avenue the top of the arched waterway will be about 20 feet above the level of the streets at its intersection with K street, and still higher at Virginia avenue. This will necessitate considerable filling to bring the adjacent squares to this level and to connect the streets of Washington with those of Georgetown.

“Between Pennsylvania avenue and P street the top of the arch will be below the level of the banks of the creek, and there will be no difficulty in uniting the two cities with the present grades of the streets.

“Between P and R streets it is proposed to fill the valley so that both Q and R streets may be connected with Twenty-fourth and Twenty-fifth streets extended, as shown on the plans and sections.

“North of R street, as Massachusetts avenue is parallel to the creek and has its grade established, it is proposed to fill the valley in such a way that its slope will incline gradually from the avenue westward to Park Drive, which will be located on the east line of Oak Hill Cemetery. The inclination will be such that no street will have a greater slope than 4 feet in 100, and the encroachment on the cemetery will be as little as possible.

“Park Drive will pass under Massachusetts avenue, as heretofore proposed, into the valley above.”

AMOUNT AND COST OF FILLING—PAGE 242.

“The total amount of filling which is given in the accompanying estimates, is over 6,000,000 cubic yards. Such a quantity of material could not be ob-
tained in any one place in the District west of the Anacostia river, and could be obtained more cheaply from Virginia, south of the Potomac. It would, however, be advisable to obtain as much as possible from the suburban streets adjacent to the valley, even at a higher cost. I have, therefore, made the estimate at 40 cents a cubic yard, which is somewhat greater than it would be if all the material were obtained from a single burrow pit on the south side of the Potomac River.

"During the progress of the work an amount not to exceed 100,000 cubic yards per year will be probably deposited in the valley by contractors and builders.

"It is estimated that 1,000,000 cubic yards would be thus deposited without cost to the improvement.

"The remaining amount is distributed in the various sections of the work as follows:

From Massachusetts Avenue to Potomac River, 5,208,310 cubic yards, at 40c... $2,083,324
From Massachusetts Avenue to Pennsylvania Avenue, 4,381,000 cubic yards, at 40 cents 1,752,424
From Lyon's mill to Pennsylvania avenue, 2,201,675 cubic yards, at 40 cents... 880,670
All east of Twenty-fifth Street extended 1,069,555 cubic yards, at 40 cents... 427,822

Ten per cent should be added to the above for engineering and contingencies.

The Problem—Page 246.

"The proposition to arch over the lower part of Rock Creek means that a dam of unusual thickness, with its top at the elevation of about 70 feet, is to be
thrown across the valley of the creek, from its mouth to its intersection with Massachusetts avenue extended, thus converting the valley above the dam, to the height of the contour of 70 feet, into a reservoir. This reservoir must be prevented from filling up with water to any marked extent by an outlet having sufficient capacity to provide a free discharge for the stream during the heaviest and most prolonged rainfall that may be expected to occur throughout the basin. With the project carried to completion, the gap between Washington and Georgetown will cease to exist, and a densely populated area will be subject to flooding and possible disaster, if the dam be overtopped. The outlet once built, its discharging capacity will become practically a fixed quantity, while the ability of the basin to produce higher and higher floods at the head of the outlet will constantly increase as its surface passes from a rural toward an urban character.

"A further danger which must not be overlooked, lies in the fact that a great freshet in Rock Creek may be expected to bring down large trees, portions of iron and wooden bridges, and other debris of large quantity. Unless the covered channel be made of ample dimensions its mouth would be subject to stoppage by drift of the kind described. Whether a flood in the city would follow or not would depend on the period required to fill the reservoir formed by the embankment over the covered channel, and the possibility, which is by no means apparent, of clearing away the drift within a reasonable time. The contents of the reservoir are estimated at 177,000,000 cubic feet. With water entering at the rate of 20,000 cubic feet per second, and none leaving it, the reservoir would be filled in about two hours and a half."