



**METROPOLITAN SERVICE DISTRICT**

527 S. W. HALL, PORTLAND, OREGON 97201 222-3671

METROPOLITAN SERVICE DISTRICT  
BOARD OF DIRECTORS

PORTLAND WATER BUREAU  
1800 SW 6TH AVE.  
AUDITORIUM

MAY 28, 1976  
2:00 P.M.

A G E N D A

76-528

MINUTES

76-529

PUBLIC COMMUNICATIONS

ADMINISTRATION

76-530

FY 75-76 BUDGET TRANSFER

76-531

CASH DISBURSEMENTS

JOHNSON CREEK PROGRAM

76-532

ORDINANCE NO. 38 - THIRD PUBLIC HEARING  
AN ORDINANCE ADOPTING A PROGRAM OF  
DRAINAGE MANAGEMENT FOR THE JOHNSON  
CREEK DRAINAGE BASIN

SOLID WASTE PROGRAM

(NO BUSINESS)

ZOO PROGRAM

(NO BUSINESS)

OTHER BUSINESS



**METROPOLITAN SERVICE DISTRICT**

527 S. W. HALL, PORTLAND, OREGON 97201 222-3671

MAY 24, 1976

TO: MSD BOARD OF DIRECTORS  
FROM: MSD STAFF  
SUBJECT: STAFF REPORT FOR MAY 28, 1976

ENCLOSED HERewith FOR REVIEW AND RECOMMENDED ACTION ARE THE FOLLOWING AGENDA ITEMS:

<u>PAGE</u>	<u>ACTION RECORD NUMBER</u>	
1	76-528	MINUTES Action - <u>Approve</u> the minutes of May 14, 1976
6	76-529	PUBLIC COMMUNICATIONS Action - <u>Receive</u> comments from the public on items not listed on the meeting agenda
7	76-530	FY 75-76 BUDGET TRANSFER Action - <u>Approve</u> the Zoo Program budget transfer

PAGE                    ACTION RECORD  
                                  NUMBER

9                            76-531

CASH DISBURSEMENTS

Action - Approve Vouchers No. 450  
                                  through 460 for payment  
                                  in the total amount of  
                                  \$708.67

10                           76-532

ORDINANCE NO. 38 - THIRD PUBLIC HEARING  
AN ORDINANCE ADOPTING A PROGRAM OF  
DRAINAGE MANAGEMENT FOR THE JOHNSON  
CREEK DRAINAGE BASIN

Action - Approval of staff recommenda-  
                                  tion

OTHER BUSINESS

76-528 MINUTES

THE FOLLOWING PAGES CONTAIN THE MINUTES OF THE MAY 14, 1976  
BOARD MEETING.

THE STAFF RECOMMENDS APPROVAL OF THE MAY 14, 1976 BOARD MINUTES.



HON. JAMES J. ROBNETT  
Mayor

ROBERT T. BRYANT  
DICK R. GANNARD  
JACK S. KATO  
DON F. STUCK

City Recorder  
MRS. SHARON V. FRENTRESS

# City of Happy Valley



10602 S. E. 129th AVENUE  
PORTLAND, OREGON 97236

May 6, 1976

Mr. John Hankee  
Metropolitan Service District  
527 SW Hall  
Portland, Oregon

Dear John:

After attending a public hearing concerning the Johnson Creek Drainage Management Plan held April 28, I have become quite concerned by lack of public support for any additional tax burden that might be imposed to pay for a solution to the Johnson Creek problem. For what it's worth, I would like to express some thoughts to you and the MSD board that might offer some hopes for better public acceptance.

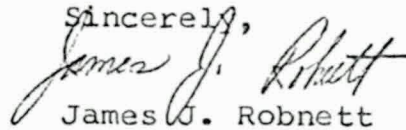
1. If a landowner leaves his land undisturbed, especially if it is covered with timber or brush, he is making a big contribution to the control of water run-off. Thus, to be fair, he should pay no tax. There are still several square miles of land in the Johnson Creek Basin in the "undisturbed" condition. Every effort should be made to encourage land owners to leave it that way.
2. If the land is used exclusively for farming, it still contributes very little, if anything to the Johnson Creek water run-off problem. Thus, the tax on the farm land should at a minimum. Further, perhaps the drainage basin tax he does pay could be further reduced if the farmer agrees to place holding ponds etc. on his property to control water run-off. Again, every effort should be made to encourage the landowner to keep it for farm use.
3. After the actual plan is complete, property owners along the creek could be encouraged to do their own construction work on their portion of the creek to bring it up to MSD standards and to do their own maintenance to MSD standards after the construction is complete. Perhaps some sort of tax credit could be allowed to give the creek side property owners this option to reduce their tax burden.
4. A real effort should be made by the MSD Board to coordinate our efforts along Johnson Creek into the CRAG Regional Plan.

For example, the Johnson Creek drainage basin between approximately SE 122nd Street and Foster Road and the Gresham city limits is now predominately "Rural" in nature. Most of the hillsides in this area are now covered with heavy brush and timber on one or both sides of the creek. Much of the remaining land is used only for farming. Thus, for several miles, this land now absorbs rainwater, that would otherwise run directly into Johnson Creek and increase the flood problem.

CRAG staff members and the CRAG task force committee recently changed the designation of this entire area from "Rural" to "Urban" on the CRAG Regional Plan map. The water run off in this area of Johnson Creek can certainly be more easily controlled if the Metropolitan Service District can persuade CRAG to change the designation for this area back to "Rural". I'm sure similar consideration could be given to other areas in the Johnson Creek drainage basin.

I would appreciate having you bring these thoughts before the MSD Board for further discussion at an appropriate time. Thank you very much.

Sincerely,



James J. Robnett

JJR:sf

76-529 PUBLIC COMMUNICATIONS

THIS AGENDA ITEM ALLOWS THE BOARD TO RECEIVE COMMENTS FROM THE PUBLIC ON ITEMS NOT LISTED ON THE MEETING AGENDA.

76-530 FY 75-76 BUDGET TRANSFER

DURING REVIEW OF THE MSD/CITY OF PORTLAND AGREEMENT CONCERNING TRANSFER OF ZOO FACILITIES TO THE DISTRICT, THE DISTRICT HAS INCURRED ATTORNEY FEES OF \$300 TO BE PAID FOR OUT OF THE MSD ZOO FUND. HOWEVER, WHEN THE ZOO BUDGET WAS INSTALLED THROUGH A SUPPLEMENTAL BUDGET, A LEGAL LINE ITEM WAS NOT LISTED. THE FOLLOWING PAGE CONTAINS A FY75-76 BUDGET TRANSFER OF \$600 FROM THE ZOO FUND CONTINGENCY TO A MATERIALS AND SERVICES LEGAL LINE ITEM. THIS BUDGET TRANSFER WILL ALLOW MSD TO PAY THE \$300 LEGAL FEES.

THE STAFF RECOMMENDS APPROVAL OF THE ATTACHED BUDGET TRANSFER.

APPROVED METROPOLITAN  
SERVICE DISTRICT  
BOARD OF DIRECTORS

ACTION NO. \_\_\_\_\_

DATE \_\_\_\_\_

BY \_\_\_\_\_

CLERK OF THE BOARD

MAY 28, 1976

ZOO FY75-76 BUDGET TRANSFER

FROM:

CONTINGENCY \$600

TO:

MATERIALS & SERVICES  
LEGAL \$600

APPROVED METROPOLITAN  
SERVICE DISTRICT  
BOARD OF DIRECTORS

ACTION NO. 76-530

DATE 5-28-76

BY Jean M. Wood  
CLERK OF THE BOARD

76-531 CASH DISBURSEMENTS

THE FOLLOWING PAGES CONTAIN ITEMS SUBMITTED FOR PAYMENT.

THE STAFF RECOMMENDS APPROVAL FOR PAYMENT OF VOUCHERS No. 450  
THROUGH 460 IN THE TOTAL AMOUNT OF ~~\$708.67.~~ \$1008.67.

APPROVED METROPOLITAN  
SERVICE DISTRICT  
BOARD OF DIRECTORS

ACTION NO. \_\_\_\_\_

DATE \_\_\_\_\_

BY \_\_\_\_\_

CLERK OF THE BOARD



M. S. D.

CASH DISBURSEMENTS

May, 1976

VOUCHER NO.	CHECK NO.	PAYABLE TO:	PURPOSE	AMOUNT	PROJECT CODE
450	450	Bicycle Boy	Sandwiches for Meetings	15.65	401 515
451	451	CH2M Hill	Services through 4/24/76	203.33	401 502
452	452	Daily Journal of Commerce	Notices of Board and Budget Meetings	17.12	401 530
453	453	C. C. Kemper	Travel Expense	37.65	401 505
454	454	NTIS	Publications	12.00	401 518
455	455	Oregonian Publishing Co.	Notice of New Tire Processing Center	17.03	403 530
			Notice of MDC Processing Site	29.20	403 530
456	456	Pacific N. W. Bell	Monthly Service	142.70	401 510
				4.56	403 510
				6.22	301 510
457	457	Portland State University	Printing	5.80	401 506
				106.15	301 506
				2.00	400 506
			Supplies	11.95	401 505
458	458	Rhodda, Inc.	Office Supplies	21.41	401 508
459	459	Rians	Meeting Expense	15.90	401 515
460	460	Western Bookkeeping Serv.	April & May Services	60.00	401 531
461	461	Hardy Butler McEwen	Legal Fees	300.00	400 531
			TOTAL	<del>708.67</del>	
				1008.67	

- 9.1 -

76-532 ORDINANCE NO. 38 - THIRD PUBLIC HEARING

AN ORDINANCE ADOPTING A PROGRAM OF DRAINAGE MANAGEMENT FOR THE JOHNSON CREEK DRAINAGE BASIN; PROVIDING FOR ADMINISTRATION, PLANNING, MAINTENANCE AND ACQUISITION OF TEMPORARY EASEMENTS; PROVIDING FOR FINANCING THROUGH SERVICE CHARGES; PROVIDING FOR COLLECTION OF SERVICE CHARGES AND PRESCRIBING A TERMINATION DATE.

THE FOLLOWING PAGES CONTAIN A STAFF REPORT SETTING OUT FINDINGS AND RECOMMENDATIONS. ALSO ATTACHED IS A REPORT RESPONDING TO COMMISSIONER GORDON'S REQUEST THAT STAFF REVIEW THE FEASIBILITY OF A "ONE-SHOT" HOME PURCHASING CONCEPT AS A SOLUTION TO THE JOHNSON CREEK FLOODING PROBLEM.

THE STAFF RECOMMENDS APPROVAL OF RECOMMENDATIONS SET OUT ON PAGE 14 OF THE STAFF REPORT.

*set over for full Board  
consideration*





May 25, 1976

TO: MSD Board of Directors

FROM: MSD Staff

SUBJECT: STAFF REPORT REGARDING ACTION ON MSD ORDINANCE NO. 38

#### INTRODUCTION

This report concludes Phase I of the Drainage Management Program for the Johnson Creek Basin which was initiated in January 1975 to evaluate and recommend an approach for implementing one or a combination of the proposed solutions to drainage and flooding problems in the Basin. During the seventeen months from January 1975 to the present, the staff has focused on past proposals and the current state of the art regarding drainage problems in urbanizing basins. In addition, funding and division of responsibilities were analyzed. The public including local public entities were involved in the process through committees, workshops, hearings and special meetings. Finally, in April 1976 an ordinance to adopt an interim program of drainage management was presented to the MSD Board for public hearings. Based on these hearings and other experiences over the past seventeen months the following findings and recommendations are submitted for Board action.

#### FINDINGS

For documentation or explanation of these findings you are referred to one of the documents listed on the bibliography (Exhibit A).

1. Severe to moderate flooding along Johnson Creek has been a long standing problem for the Southeast Portland vicinity.
2. In recent years erosion and water quality problems have increased to the point where they may be more significant than the flooding problem.
3. The annual cost of flooding alone has reached \$476,000 and significant water quality problems exist at both high and low flow periods.
4. No unanimity exists regarding the best solution for all of the drainage related problems along Johnson Creek.
5. Local governments have been unable to deal successfully with these problems partially because the creek is generally within private ownership.
6. Most of the problems originate in the upper portions of the basin but impact only the lower portions.
7. Any solution must encompass a comprehensive water resource management program including flood control, water pollution control, water supply; erosion control, recreation and fish and wildlife preservation.
8. Any solution must spread the cost equitably among those who cause the problem as well as those who directly benefit from the solution.
9. While many solutions to flooding have been suggested, only one has been detailed sufficiently to adequately project costs and other impacts.
10. The Corps of Engineers has developed the one detailed proposal that is available and is prepared to evaluate the other alternatives under a separate authorization.
11. Ordinance No. 38 provides a means to complete the necessary planning while providing interim physical solutions that would be necessary regardless of the long-range solution ultimately chosen.

12. Property owners who live along the creek but are not flooded or who do not live near the creek but within the basin are opposed to any solution that cost them additional taxes.
13. The Water Resource Department will not support the MSD proposal before the Emergency Board of the State Legislature unless there is an "indication of strong public support for (the) proposal" (letter 5/4/76).
14. There is a strong indication from the people in attendance at the hearings that passage of Ordinance No. 38 would result in a remonstrance petition.
15. With public attitude as it is toward government, the remonstrance petition would probably result in a 4 to 1 opposition toward passage of Ordinance No. 38.
16. Any solution must be flexible to meet the various concerns expressed by the public yet rigid to avoid the criticism of open-endedness.
17. If nothing is accomplished to solve these problems the next effort will meet even more apathy and a public solution may be lost until a real crisis occurs.
18. The public does not recognize the "contribution" theory that is basic to the proposed funding method of Ordinance No. 38.
19. Maintenance of the creek channel and control on drainage impacts from new developments must be implemented to provide some stability while long-range plans proceed.
20. With the possible exception of funding, the greatest obstacle to implementation will be education of the general public towards stream management.

## STAFF RECOMMENDATIONS

The staff recommends that the MSD Board abandon Ordinance No. 38 and pursue an interim program of coordination funded by local or state contributions. This interim program should be continued until completion of the Portland-Vancouver Metropolitan Area Water Resource Study in September of 1979, at which time the Board should reconsider its role in development of the resultant plan. The objectives of the interim program should be:

1. Implementation of public employment programs of the appropriate local jurisdictions to develop a creek maintenance program;
2. Adoption of a nuisance abatement ordinance requiring property owners along the creek to control vegetation and loose debris that may impede flow;
3. Adoption of a site development control ordinance to regulate the impact of construction practices on the drainage system.
4. Adoption of flood plain ordinances compatible with the HUD flood insurance requirements;
5. Coordination with the Corps of Engineers and CRAG in developing a long-range technical and funding solution to the drainage, flood control and water quality problems in the Johnson Creek Basin; and
6. Review of the above ordinances and plans by a new Citizens Advisory Committee for drainage in the Johnson Creek Basin.

These objectives can be accomplished by a coordinated effort between MSD and the respective local jurisdictions. The MSD can provide the means for coordinating the development and

implementation of the ordinances and plans by providing for staff support and a multi-jurisdictional citizens advisory committee. The local jurisdictions can provide the implementation mechanism by adopting the ordinances for their respective localities and enforcing the provisions thereafter. When a more definitive solution is developed, the division of responsibility may be adjusted as warranted.

The cost of a project coordinator assuming half time salary and overhead is approximately \$12,000 for FY 76-77. This would break down to the following costs for the respective jurisdictions if allocated by area or population within the basin.

FUNDING CONTRIBUTION

<u>Jurisdiction</u>	<u>Population/Contribution</u>	<u>Area (Sq.Mile) Contribution</u>
Portland	17,700/\$2,194	6.99/\$1,879
Happy Valley	100/\$12	0.21/\$56
Gresham	7,711/\$956	6.69/\$1,798
Milwaukie	7,625/\$945	1.86/\$500
Clackamas County	13,007/\$1,612	12.86/\$3,456
Multnomah County	50,670/\$6,281	16.04/\$4,311
TOTAL	96,813/\$12,000	44.65/\$12,000

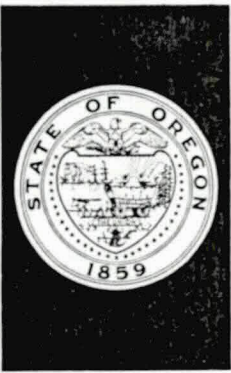
The costs, other than those above, required to implement the interim program would be determined as part of the development of the ordinances.

Attached to this report are copies of two letters received from the State Water Resources Department and James Robnett of Happy Valley regarding the proposed Ordinance No. 38.

E X H I B I T      A

BIBLIOGRAPHY

1. Drainage Management in the Johnson Creek Basin, MSD Staff Report, November 1975.
2. Hearings Officer's Report - Proposed Johnson Creek Basin Drainage Management Plan, W. L. Myllenbeck, February 1976.
3. Water Quality in Johnson Creek, Department of Environmental Quality, December 1975.
4. Design Memorandum, Johnson Creek at Portland and Vicinity, Oregon, Army Corps of Engineers, April 1975.
5. Plan of Study, Portland-Vancouver Metropolitan Area Water Resources Study (revised draft), Army Corps of Engineers, March 1976.



## WATER RESOURCES DEPARTMENT

1178 CHEMEKETA STREET N.E. • SALEM, OREGON • 97310 • Phone 378-3671

ROBERT W. STRAUB  
GOVERNOR

May 4, 1976

John Hankee  
Office Engineer  
Metropolitan Service District  
527 S.W. Hall  
Portland, OR 97201

Dear Mr. Hankee:

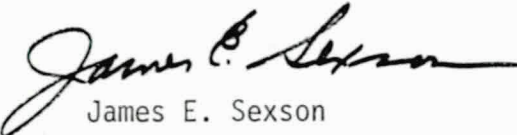
This letter is in answer to your request that the Water Resources Department act on behalf of the Metropolitan Service District in requesting a \$150,000 grant from the State Emergency Board.

Your proposal, as outlined in "Drainage Management in the Johnson Creek Basin", November 1975, appears to be a very valid and reasonable approach to solving the flooding problem.

Before the Water Resources Department could act on your behalf, however, we would prefer to have an indication of strong public support for your proposal. According to the information I have received, most of the testimony at the recent hearings you held was in opposition to the flood management plan.

If you can provide us with evidence of residential interest in your proposal, we will gladly reconsider your request.

Sincerely,

  
James E. Sexson

JES/DL:slv

cc: The Honorable Jason D. Boe  
Oregon State Senate

The Honorable Philip D. Lang  
Oregon House of Representatives

Janet McLennan, Assistant to the Governor  
for Natural Resources



HON. JAMES J. ROBBETT  
Mayor

ROBERT T. BRYANT  
DICK R. GANNARD  
JACK S. KATO  
DON F. STUCK

City Recorder  
MRS. SHARON V. FRENTRESS

## City of Happy Valley



10602 S. E. 129th AVENUE  
PORTLAND, OREGON 97236

May 6, 1976

Mr. John Hankee  
Metropolitan Service District  
527 SW Hall  
Portland, Oregon

Dear John:

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1. If a landowner leaves his land undisturbed, especially if it is covered with timber or brush, he is making a big contribution to the control of water run-off. Thus, to be fair, he should pay no tax. There are still several square miles of land in the Johnson Creek Basin in the "undisturbed" condition. Every effort should be made to encourage land owners to leave it that way.
2. If the land is used exclusively for farming, it still contributes very little, if anything to the Johnson Creek water run-off problem. Thus, the tax on the farm land should at a minimum. Further, perhaps the drainage basin tax he does pay could be further reduced if the farmer agrees to place holding ponds etc. on his property to control water run-off. Again, every effort should be made to encourage the landowner to keep it for farm use.
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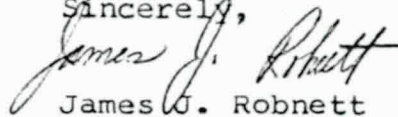


For example, the Johnson Creek drainage basin between approximately SE 122nd Street and Foster Road and the Gresham city limits is now predominately "Rural" in nature. Most of the hillsides in this area are now covered with heavy brush and timber on one or both sides of the creek. Much of the remaining land is used only for farming. Thus, for several miles, this land now absorbs rainwater, that would otherwise run directly into Johnson Creek and increase the flood problem.

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I would appreciate having you bring these thoughts before the MSD Board for further discussion at an appropriate time. Thank you very much.

Sincerely,



James J. Robnett

JJR:sf

May 20, 1976

EVALUATION OF "ONE-SHOT" PROPOSAL

At the conclusion of the second hearing before the Board of Directors of the Metropolitan Service District on the Johnson Creek proposal, Commissioner Mel Gordon requested the staff to investigate the feasibility of a "one-shot" home purchasing program to relieve the annual flood damage currently being experienced. Commissioner Gordon asked that the staff respond to five particular questions in evaluating this proposal. The questions have been listed sequentially below followed by answers based on the best available data. Generally, the proposal does not seem feasible without detailed evaluation of the alternative combinations of solutions.

A strict home purchasing program would cost in excess of six million dollars and leave unsolved the problems of erosion and water quality degradation. While it is comprehensible that the costs could be reduced and the benefits increased by implementing other measures in cooperation with the home purchasing programs, it would take a major study to determine what that optimum combination would be. In addition, it is unlikely that any "one-shot" solution could be effective without some on-going maintenance and monitoring program. Compare the drainage system with any other public facility - sanitary sewers, water distribution or roads - and note that each requires continued maintenance and monitoring to assure dependable results.

1. *What would be the cost of a "one-shot" home purchasing program? Is it a reasonable cost and how does it compare to the cost of the staff's proposed program?*

In the 1975 Design Memorandum, the Corps of Engineers estimated the Benefit/Cost ratio for a greenway would be 0.39 to 1.0 over a 50 year life of project at a discount rate of 5 5/8%. In attempting to track down the basis for this estimate, we found no documentation, however, the same report does provide some valuation figures that may shed some light on the possible costs. The total valuation of improvements in the flood plain for various floods are shown below.

<u>Flood</u>	<u>Flood Plain Value</u>
8 year (1972)	\$20,375,000
16 year (1964)	\$46,999,000
50 year	\$71,717,200
100 year	\$82,350,600

These land values include land, improvements on the land and contents within the improvements. They include residential commercial and industrial properties, public facilities, roads, railroads, bridges and public utilities. A breakdown is shown on the attached table. A map is also attached to show the bounds of each reach.

Using the above data and assuming protection from an 8 year flood, the cost of a "one-shot" home purchasing program can be estimated. Design for an 8 year flood frequency event is less than the minimum practice for storm drain systems and significantly less than the design life of normal flood protection projects. Therefore, utilization of 8 year flood data appears to be a minimum in order to obtain any results. Using the valuation data for land and improvements of residential property only, the estimated cost in 1973 dollars is \$5,381,400. In addition, the MSD would be required to comply with state law regarding relocation assistance. Therefore, the costs would likely exceed six million dollars.

Ways could be devised to reduce these costs, if the flood plain was analyzed and reduced in appropriate areas by artificial means. Much of the residential damage occurs along Foster Road in the Lents area. From visual inspection, purchase of a major portion of the Lents area could be reduced by diking a short space of land. The comparative costs and benefits, however, remain unknown and can not be properly evaluated without engaging in a detailed study.

If left strictly as a home purchase program, the costs would exceed the costs of the staff proposed interim program by a factor of six. However, the expenses of the staff proposed program would likely continue after the conclusion of the interim period. Because the rate and length of continued expenditures is unknown, it is impossible to compare the programs realistically.

2. *Will it be necessary to also purchase some commercial and industrial land? If so, how much will it cost?*

To obtain adequate results, it will probably be necessary to also purchase the industrial and commercial land within the 8 year flood plain. This would cost an additional \$2.5 million plus the costs of relocation, appraisal and negotiations. Therefore, the total cost of this "one-shot" program would exceed nine million dollars. While combinations of land purchasing and other flood proofing methods appear more reasonable, sufficient data is not available to select the best combination.

3. *Will a "one-shot" program serve to solve the flooding problem over the long-term or will it merely delay other necessary measures for a few years.*

Assuming the MSD would pursue a land purchasing solution, it should be pointed out that the results would not be as comprehensive as other types of solutions. The staff proposed interim program is designed to find answers to three related problems:

flooding, water pollution and surface erosion. The one-shot program alone can only solve the flooding problem. Actually, the flooding problem is not solved but the resultant damage is reduced. A symptom is dealt with rather than the cause. Related symptoms would remain unsolved and these problems may well be the more serious. Eventually, the erosion and pollution problems would have to be solved and would require additional expenditures of funds. In the meantime, the uncontrolled stream flow may destroy the natural characteristics of the streams environment, thereby reducing the number of alternative solutions available.

4. *What supplementary measures would be required in the one-shot program (e.g. dikes; control of development in the basin; require property owners to install runoff collection systems; etc.)?*

Some of the adverse consequences of the "one-shot" home purchasing program could be reduced with supplementary programs. As mentioned flood proofing measures such as diking could be used to reduce the costs of land acquisition but the economics of this complimentary proposal are unknown. The cost of building dikes, the number of properties that would be flood proofed and the valuation of the lands as residential rather than public property are factors that must be considered. Control of development practices within the drainage basin could work well to compliment a flood plain purchase plan. The flood plain purchase would reduce today's flood damage problems and the development control program would check the impacts of development on runoff rates and quality. If the program was sufficiently enforced, even current erosion and pollution problems could be alleviated. However, this program would require a continuous monitoring and enforcement program complete with staff and overhead costs. Finally, some type of public land maintenance program would be required to compliment any "one-shot" land purchase program. This has a tendency to negate the desirability of this approach since it no longer appears to be a one-shot deal. However, it is possible that the continuing portions of the program could be funded from the general funds of each local jurisdiction. The land acquisition itself would be funded by basin residents. In one sense, the program would then be a "one-shot" deal.

5. *Would the program adequately protect public facilities such as roads, power lines, telephone lines, sewer systems, etc. from flood damage?*

The land purchase program does not protect public facilities unless the program assumes additional costs for the relocation of some or all of the utilities in question. Some of the facilities may not be sufficiently disrupted to justify relocation but if desired, the costs to relocate or flood proof them will be significant.

In summary, many of the questions concerning a "one-shot" home purchasing program cannot be adequately answered based on current data. It is precisely this problem that drew the staff to the conclusion that a long range proposal cannot be recommended until the alternatives have been adequately evaluated both economically

and environmentally. More data and analysis is required before any permanent solution can be intelligently recommended.



VALUE OF LAND, IMPROVEMENTS, CONTENTS (\$1,000)

REACH #1	*	FLOOD FREQUENCY				
		8 Year (1972)	16 Year (1964)	50 Year	100 Year	200 Year
<u>Residential</u>	L	-	-	4.0	14.0	25.0
	I	-	-	-	48.0	48.0
	C	-	-	-	29.0	29.0
<b>Total</b>		-	-	4.0	91.0	102.0
<u>Commercial</u>	L	123.0	221.0	669.0	825.0	1,026.0
	I	-	1,550.0	3,097.0	3,547.0	3,572.0
	C	-	2,500.0	7,985.0	8,453.0	8,463.0
<b>Total</b>		123.0	4,271.0	11,751.0	12,825.0	13,061.0
<u>Industrial</u>	L	61.0	79.0	144.0	285.0	397.0
	I	-	525.0	2,125.0	2,125.0	2,125.0
	C	-	300.0	602.0	602.0	602.0
<b>Total</b>		61.0	904.0	2,871.0	3,012.0	3,124.0
<u>Public Facilities</u>	L	2.0	15.0	17.0	19.0	20.0
	I	-	-	-	60.0	60.0
	C	-	-	-	25.0	25.0
<b>Total</b>		2.0	15.0	17.0	104.0	105.0
<u>Roads</u>	L	3.0	5.0	13.0	15.0	19.0
	I	9.0	24.0	52.0	58.0	68.0
<u>Railroads</u>	L	-	0.2	0.2	0.2	0.2
<u>Bridges</u>		371.0	371.0	371.0	371.0	371.0
<b>Total</b>		383.0	400.2	436.2	444.2	458.2
<u>Public Utilities</u>						
PGE		-	1.0	2.0	2.0	3.0
PNB		22.0	48.0	118.0	130.0	130.0
NW Nat. Gas		3.0	6.0	11.0	20.0	20.0
Sewer System		639.0	639.0	639.0	639.0	639.0
<b>Total</b>		664.0	694.0	770.0	791.0	792.0
<b>REACH #1 TOTAL</b>		1,233.0	6,284.2	15,849.2	17,267.2	17,642.2

Where:

L = Land

I = Improvements

C = Contents

\* See plate 1 for location

VALUE OF LAND, IMPROVEMENTS, CONTENTS (\$1,000)

<u>REACH #2</u>	*	<u>FLOOD FREQUENCY</u>				
		<u>8</u> <u>Year</u> <u>(1972)</u>	<u>16</u> <u>Year</u> <u>(1964)</u>	<u>50</u> <u>Year</u>	<u>100</u> <u>Year</u>	<u>200</u> <u>Year</u>
<u>Residential</u>	L	420.0	631.0	907.0	1,116.0	1,369.0
	I	449.0	918.0	1,385.0	2,583.0	2,789.0
	C	282.0	575.0	868.0	1,619.0	1,748.0
<u>Total</u>		<u>1,151.0</u>	<u>2,124.0</u>	<u>3,160.0</u>	<u>5,318.0</u>	<u>5,906.0</u>
<u>Commercial</u>	L	155.0	220.0	399.0	487.0	666.0
	I	98.0	439.0	675.0	1,928.0	1,942.0
	C	48.0	260.0	606.0	2,135.0	2,144.0
<u>Total</u>		<u>301.0</u>	<u>919.0</u>	<u>1,680.0</u>	<u>4,550.0</u>	<u>4,752.0</u>
<u>Industrial</u>	L	114.0	221.0	421.0	542.0	621.0
	I	399.0	553.0	1,236.0	1,940.0	2,080.0
	C	960.0	1,267.0	2,734.0	3,762.0	3,870.0
		<u>1,473.0</u>	<u>2,041.0</u>	<u>4,391.0</u>	<u>6,244.0</u>	<u>6,571.0</u>
<u>Public</u>	L	90.0	100.0	150.0	231.0	278.0
<u>Facilities</u>	I	-	25.0	25.0	25.0	25.0
<u>Total</u>		<u>90.0</u>	<u>125.0</u>	<u>175.0</u>	<u>256.0</u>	<u>303.0</u>
<u>Roads</u>	L	7.0	10.0	26.0	37.0	42.0
	I	14.0	29.0	70.0	87.0	107.0
<u>Railroads</u>	L	4.0	5.8	7.8	8.2	10.8
<u>Bridges</u>		521.0	521.0	521.0	521.0	521.0
<u>Total</u>		<u>546.0</u>	<u>565.8</u>	<u>624.8</u>	<u>653.2</u>	<u>680.8</u>
<u>Public</u>						
<u>Utilities</u>						
<u>PGE</u>		1.0	2.0	5.0	6.0	8.0
<u>PNB</u>		91.0	183.0	353.0	450.0	465.0
<u>NW Nat. Gas</u>		25.0	49.0	74.0	125.0	132.0
<u>Sewer System</u>		2,290.0	2,290.0	2,290.0	2,290.0	2,290.0
<u>Total</u>		<u>2,407.0</u>	<u>2,524.0</u>	<u>2,722.0</u>	<u>2,871.0</u>	<u>2,895.0</u>
<u>REACH #2 TOTAL</u>		<u>5,968.0</u>	<u>8,298.8</u>	<u>12,752.8</u>	<u>19,892.2</u>	<u>21,107.8</u>

Where: L = Land  
I = Improvements  
C = Contents

\* See plate 1 for location

VALUE OF LAND, IMPROVEMENTS, CONTENTS (\$1,000)

REACH #3	*	FLOOD FREQUENCY				
		8 Year (1972)	16 Year (1964)	50 Year	100 Year	200 Year
<u>Residential</u>	L	1,366.0	2,075.0	3,658.0	3,685.0	3,841.0
	I	3,085.0	4,645.0	7,754.0	8,317.0	8,528.0
	C	1,899.0	2,859.0	4,772.0	5,119.0	5,249.0
<u>Total</u>		6,550.0	9,579.0	16,184.0	17,121.0	17,618.0
<u>Commercial</u>	L	488.0	627.0	701.0	718.0	725.0
	I	376.0	617.0	1,001.0	1,122.0	1,126.0
	C	398.0	562.0	684.0	910.0	919.0
<u>Total</u>		1,262.0	1,806.0	2,386.0	2,750.0	2,770.0
<u>Industrial</u>	L	456.0	673.0	1,251.0	1,321.0	1,385.0
	I	244.0	5,384.0	9,812.0	10,124.0	10,124.0
	C	274.0	3,194.0	6,578.0	6,726.0	6,726.0
		974.0	9,251.0	17,641.0	18,171.0	18,235.0
<u>Public Facilities</u>	L	4.0	4.0	4.0	5.0	6.0
	<u>Total</u>	4.0	4.0	4.0	5.0	6.0
<u>Roads</u>	L	51.0	68.0	122.0	135.0	141.0
	I	216.0	296.0	530.0	590.0	614.0
<u>Railroads</u>	L	20.4	23.6	28.4	31.8	36.6
	I	13.2	22.0	44.0	48.4	57.2
<u>Bridges</u>		452.0	452.0	452.0	452.0	452.0
<u>Total</u>		752.6	861.6	1,176.4	1,257.2	1,300.8
<u>Public Utilities</u>						
PGE		24.0	336.0	361.0	367.0	368.0
PNB		238.0	418.0	781.0	823.0	836.0
NW Nat. Gas		101.0	158.0	381.0	471.0	479.0
Sewer System		2,557.0	2,557.0	2,557.0	2,557.0	2,557.0
<u>Total</u>		2,920.0	3,469.0	4,080.0	4,218.0	4,240.0
<u>Agricultural</u>	L	271.0	391.0	447.0	465.2	484.8
	I	-	347.0	369.1	369.1	369.1
	C	18.0	230.6	244.5	244.5	244.5
<u>Total</u>		289.0	968.6	1,060.6	1,078.8	1,098.4
<u>REACH #3 TOTAL</u>		12,751.6	25,939.2	42,532.0	44,601.0	45,268.2

Where: L = Land  
I = Improvements  
C = Contents



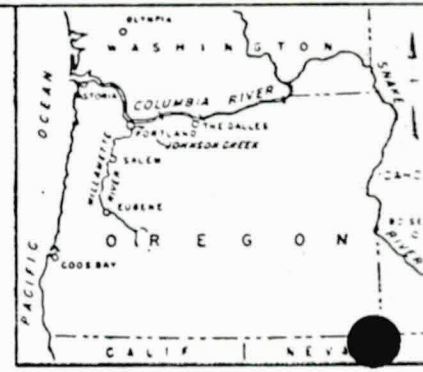
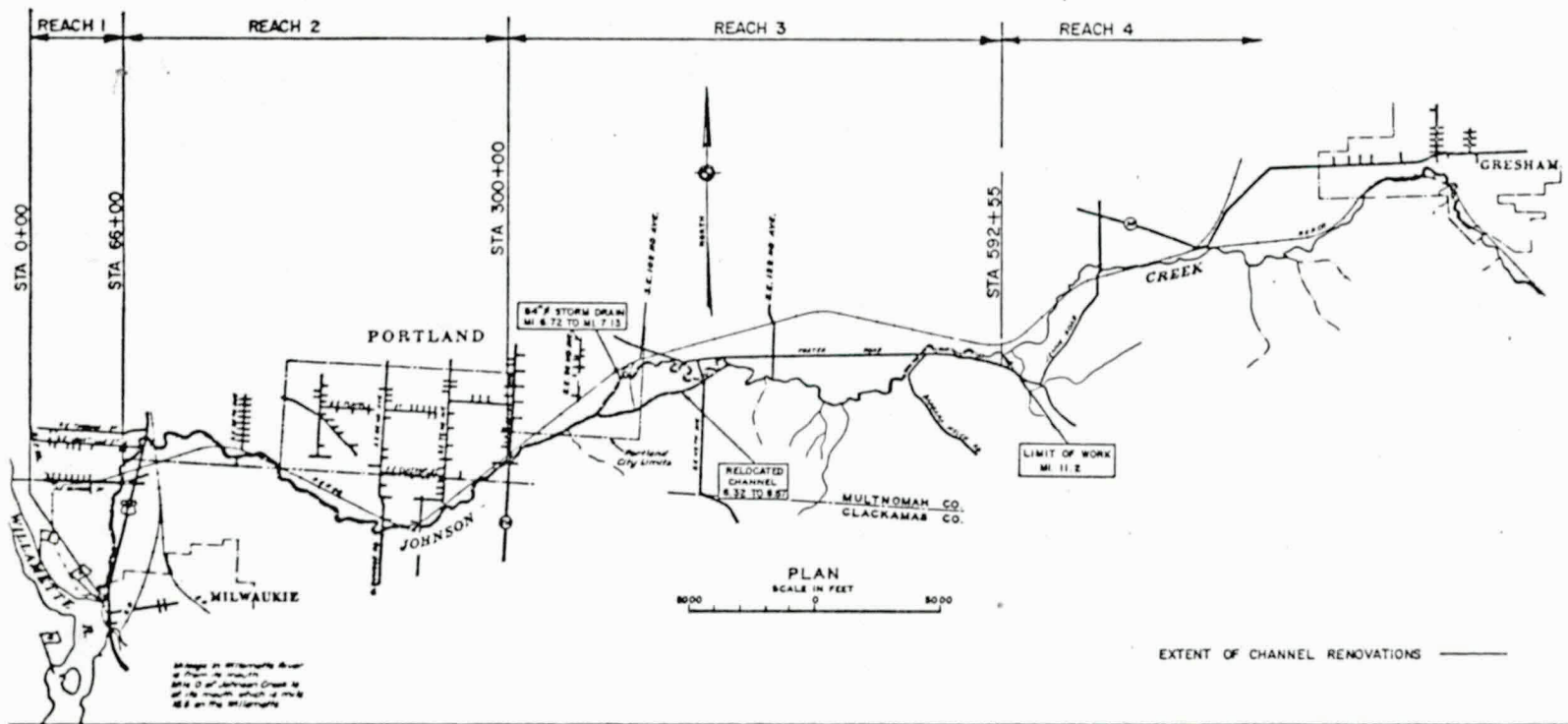
VALUE OF LAND, IMPROVEMENTS, CONTENTS (\$1,000)

REACH #4	*	FLOOD FREQUENCY				
		8 Year (1972)	16 Year (1964)	50 Year	100 Year	200 Year
<u>Residential</u>	L	34.9	38.1	42.1	46.4	49.3
	I	26.5	26.5	26.5	26.5	26.5
	C	16.7	16.7	16.7	16.7	16.7
Total		<u>78.1</u>	<u>81.1</u>	<u>85.3</u>	<u>89.6</u>	<u>92.5</u>
<u>Public Facilities</u>	L	7.6	8.9	11.0	13.4	16.8
	I	-	-	-	-	15.0
Total		<u>7.6</u>	<u>8.9</u>	<u>11.0</u>	<u>13.4</u>	<u>31.8</u>
<u>Roads</u>	L&I	0.7	0.8	0.9	1.2	1.6
<u>Bridges</u>		186.0	186.0	186.0	186.0	186.0
Total		<u>186.7</u>	<u>186.8</u>	<u>186.9</u>	<u>187.2</u>	<u>187.6</u>
<u>Portland Water Bureau</u>		100.0	100.0	100.0	100.0	100.0
<u>Sewer System</u>		50.0	100.0	200.0	200.0	200.0
Total		<u>150.0</u>	<u>200.0</u>	<u>300.0</u>	<u>300.0</u>	<u>300.0</u>
<u>REACH #4 TOTALS</u>		422.4	476.8	583.2	590.2	611.9

Total Reach 1,2,3 & 4    20,375.0    40,999.0    71,717.2    82,350.6    84,630.1

Where:    L = Land  
           I = Improvements  
           C = Contents

\* See plate 1 for location



PLAN  
SCALE IN FEET  
0 8000

EXTENT OF CHANNEL RENOVATIONS ———

CHANNEL RENOVATIONS  
JOHNSON CREEK, OREGON  
U.S. ARMY ENGINEER DISTRICT, PORTLAND  
NORTH PACIFIC DIVISION  
PREPARED 1 APRIL 1975

METROPOLITAN SERVICE DISTRICT

ORDINANCE NO. 38

An Ordinance adopting a program of drainage management for the Johnson Creek Drainage Basin; providing for administration, planning, maintenance and acquisition of temporary easements; providing for financing through service charges; providing for collection of service charges and prescribing a termination date.

ORDINANCE NO. 38

The Metropolitan Service District hereby ordains:

Section 1. Short Title.

This Ordinance shall be known as the Johnson Creek Drainage Management Ordinance and may be so cited and pleaded and shall be cited herein as "this ordinance".

Section 2. Codification.

This ordinance may be codified in the Code of the MSD.

Section 3. Findings.

The Board finds that:

- A. The Metropolitan Service District is authorized under ORS 268.030 to provide metropolitan aspects of surface water control.
- B. Johnson Creek flooding and related problems have been plaguing Southeast Portland and portions of Multnomah and Clackamas County for at least forty years.
- C. Annual flood costs to existing improvements average \$476,000.
- D. Local jurisdictions have been unable to coordinate a workable solution to the Johnson Creek problems.
- E. The channel improvements recommended in the April, 1975 Design Memorandum - Johnson Creek at Portland by the Corps of Engineers could result in negative environmental impacts without a detailed evaluation of possible alternatives.
- F. The Corps of Engineers is currently authorized by a resolution of the Committee on Public Works of the United States Senate to undertake the Portland-Vancouver Metropolitan Area Water

Resources Study.

G. The Corps' Water Resources Study provides the means to develop a comprehensive drainage management plan for the Johnson Creek Basin.

I. Creek maintenance (cleaning and grubbing) will be necessary regardless of the alternative drainage management plan selected.

J. Maintenance easements are required prior to any maintenance program.

K. Public participation in developing the comprehensive plan is desirable.

L. Every property within the Johnson Creek Drainage Basin contributes some runoff to the flow in the Creek.

M. Funding of drainage management programs should be the burden of all property owners contributing to the problem.

Section 4. Purpose.

A. The purpose of this ordinance is to:

(1) Protect the health, safety and welfare of the people in the District, and especially those who reside in the Johnson Creek Drainage Basin;

(2) Reduce damage and inconvenience caused by flooding and drainage problems within the basin;

(3) Provide an optimum solution to the drainage problems throughout the basin;

(4) Protect the natural qualities of the stream system while providing adequate drainage.

(5) Develop a long-range drainage management plan in cooperation with the Corps of Army Engineers and local jurisdictions and citizens within the basin.

B. This ordinance shall be liberally construed for the accomplishment of these purposes.

Section 5. Definitions.

As used in this ordinance, unless the context requires otherwise:

- A. Basin. Basin means the Johnson Creek Drainage Basin as located on the map attached as Exhibit A to this ordinance.
- B. Board. Board means the Board of Directors of the Metropolitan Service District.
- C. District. District means the Metropolitan Service District.
- D. Impervious Surface. Impervious surface means any man-made surface which water will not penetrate, including without limitation, concrete, asphalt, roofing material and bricks.
- E. MSD. MSD means the Metropolitan Service District.
- F. Manager. Manager means the chief administrative officer of the MSD.
- G. Person. Person means any individual, corporation, industry, partnership, association, firm, trust or estate.
- H. Program. Program means the Johnson Creek Drainage Management Program.
- I. Rural Area. Rural area means that area in the Basin designated rural on Exhibit A.
- J. Service Charge. Service charge means a charge for services rendered by the District in administering, implementing and operating this ordinance.

K. Urban Area. Urban area means that area in the Basin designated urban on Exhibit A.

L. Vacant Land. Vacant land means land that has less than one percent impervious surface coverage.

Section 6. Rules and Regulations.

The Board may promulgate rules and regulations for the administration and implementation of this ordinance.

Section 7. Administration.

The Manager shall be responsible for the administration, implementation and operation of this ordinance and any rules and regulations promulgated hereunder. In order to implement this ordinance, the Manager shall have the authority to:

- A. Make contracts on behalf of the District.
- B. Negotiate and execute easements on behalf of the District.
- C. Obtain necessary permits for removal of gravel and sand.

Section 8.

The Board authorizes and approves a 3-year Johnson Creek Drainage Management Program beginning July 1, 1976 which will include:

- A. Securing access to Johnson Creek for maintenance purposes only.
- B. Maintaining Johnson Creek by clearing debris, fallen trees and overgrown brush and removing sand and gravel deposits impeding the flow of water.
- C. Reducing bank erosion.
- D. Developing a long-range drainage management plan

with the Corps of Army Engineers and local jurisdictions and citizens within the Basin.

E. Developing a program of citizen involvement in planning, maintenance and Program implementation.

F. Developing a site control ordinance.

Section 9. Service Charges.

A. The administration, implementation and operation of the Program and this ordinance shall be paid for by service charges. The Board shall set the service charges annually by ordinance. Service charges will be levied against the property within the basin in accordance with the amount of impervious surface on urban land and on gross area of land for vacant and rural land.

B. Service charges will be levied annually for two years, for fiscal year July 1, 1977 - June 30, 1978 and fiscal year July 1, 1978 - June 30, 1979.

C Service charges shall not exceed:

<u>Max.Rate per Unit</u>	<u>Unit</u>	<u>Applicable Land uses</u>	<u>Max.Total Annual fee</u>
\$1.00	Acre	Vacant	\$5.00
\$1.00	5 acres	Rural	\$50.00
\$.005	sq. ft. of imper- vious surface	Urban-single family residential	\$20.00
\$.005	Sq. ft. of imper- vious surface	Urban-all others (commercial, indust., multi-family, etc.)	\$400.00

Section 10. Easements/Condemnation.

A. The easements to be used in the program shall be in a form similar to the form of easement attached as Exhibit B. Variations may be made from this form if approved by the Manager and the property owner.



B. The power of condemnation shall not be used by the District to secure easements necessary to implement this ordinance, except as provided in subsection 10(C).

C. A property owner may perform those maintenance and cleaning functions contemplated by this ordinance and approved by the Manager for those portions of Johnson Creek in which the owner has an interest. If a property owner refuses to maintain and clean the owner's portion of Johnson Creek, and if the owner refuses MSD permission by easement or otherwise to gain access to the owner's portion of Johnson Creek and to perform the maintenance and cleaning duties deemed necessary by the Manager, then MSD may use its condemnation power in accordance with law.

Section 11. Collection of Service Charges.

A. Service charges will be determined and billed to property owners prior to the beginning of each fiscal year and shall be due and payable within 30 days from the date of billing. All service charges shall be payable to the Metropolitan Service District and all money received by the MSD under this ordinance shall be deposited in the Johnson Creek Drainage Management Account and shall be used only for the administration, operation and implementation of the Program, this ordinance and any rules and regulations promulgated hereunder.

B. Any property owner who considers the service charges applicable to his/her property to be inequitable may apply to the Manager for adjustment thereof. Such application shall be made in writing within 20 days after billing and shall specify why the charge is inequitable. The Manager may affirm, deny or modify the service charges previously made against the specific property. If

dissatisfied with the Manager's decision, the property owner may request the Board to review his/her application and the Manager's decision. Such request shall be in writing and made within 20 days after the Manager's decision. The Board shall notify the property owner of the time and place the Board will consider the request for review, and the property owner shall have the right to be heard on the request.

Section 12. Johnson Creek Citizens Advisory Committee.

The Board approves and creates, during the term of this Ordinance, a Johnson Creek Citizen Advisory Committee. The Committee will advise the Board and the Manager on all matters related to the operation and implementation of the Johnson Creek Drainage Management Program. The Board will appoint the Committee members from jurisdictions within the Basin:

Clackamas County - 3 members

Multnomah County - 4 members

Happy Valley - 1 member

Portland - 5 members

Milwaukie - 2 members

Gresham - 3 members

The Committee may select such officers and adopt such rules and meeting schedules as deemed appropriate and necessary by the Committee members. The Committee will comply with the Oregon Public Meeting Law. Staff assistance will be provided by the District. Nominations for Committee membership may be made at any time by any person to the Board.

Section 13. Savings Clause.

In the event any provision or section of this ordinance is declared invalid, such declaration shall not affect the validity of any other provision or section herein, which sections and provisions shall remain in full force and effect.

Section 14. Termination.

This ordinance and the Program shall terminate effective June 30, 1979. Any surplus service charges remaining at the termination of the Program will at the Board's discretion, be returned to the property owners in an amount proportionate to the amount originally paid by each property owner, or to the local jurisdictions in an amount proportionate to their respective population in the Basin for services or work being, or to be performed, by such local jurisdictions directly related to Johnson Creek drainage problems.

---

Ray Miller, Chairman

EXHIBIT B  
TEMPORARY EASEMENT

Recitals:

1. (Owners) are all the persons having an ownership interest in the real property located at \_\_\_\_\_ (street address) \_\_\_\_\_ (City), Oregon and more particularly described as:

LEGAL DESCRIPTION

2. Johnson Creek flows through or abuts the above-described property.

3. The Metropolitan Service District (MSD) is a municipal corporation authorized to control the flow of and provide drainage for surface waters under Oregon Revised Statutes 268.310(3).

4. MSD has started a 3-year Johnson Creek Drainage Management Program (Program) which includes cleaning Johnson Creek of debris, fallen trees, overgrown brush and sand and gravel deposits impeding the flow of water.

5. The owners have agreed to grant to MSD a three-year easement for the purposes described below.

Agreement

6. The owners grant to MSD an easement over and upon the real property described above for the purposes in paragraph 7, the location of the easement being shown on Exhibit A attached hereto and made a part hereof.

7. The easement is to be used only by MSD or its contractor for:

a. cleaning Johnson Creek of debris, fallen trees and sand and gravel deposits impeding the flow of water.

b. Gaining access to Johnson Creek.

c. Removing those standing trees, shrubs and bushes substantially impeding the flow of water as located on Exhibit A and only with the written consent of the Owners.

8. The consideration for this easement is the mutual covenants and promises contained herein and \$\_\_\_\_\_.

9. This easement shall terminate effective June 30, 1979.

10. This easement may not be assigned or transferred by MSD to any other person or governmental entity without the written consent of the owners.

Dated this \_\_\_\_\_ day of \_\_\_\_\_, 19\_\_\_\_.

\_\_\_\_\_  
\_\_\_\_\_

OWNERS

Notaries for all signators.



**METROPOLITAN SERVICE DISTRICT**

527 S. W. HALL, PORTLAND, OREGON 97201 222-3671

METROPOLITAN SERVICE DISTRICT

BOARD OF DIRECTORS

NOTICE IS HEREBY GIVEN THAT THE GOVERNING BODY OF THE METROPOLITAN SERVICE DISTRICT WILL MEET IN QUORUM TO ATTEND A PUBLIC HEARING HELD BY THE MULTNOMAH COUNTY TAX SUPERVISION AND CONSERVATION COMMISSION TO GIVE CONSIDERATION TO THE MSD FY 76-77 BUDGET DOCUMENT. THE HEARING WILL BE HELD AT THE MULTNOMAH COUNTY COURTHOUSE, ROOM 608, AT 3:30 P.M., ON THURSDAY, JUNE 3, 1976. INTERESTED PERSONS ARE INVITED TO ATTEND. COPIES OF THE BUDGET WILL BE AVAILABLE FOR PUBLIC VIEW.

*mailed to  
attached 5-28-76  
J. Wood*



MSD Board

5-28-76

NAME

REPRESENTATION

<u>NAME</u>	<u>REPRESENTATION</u>
Joyce Boles	Community Press
Jo Mancuso	The Oregonian
A. C. LARSON	SELF
E. C. LARSON	"
A. L. Linkous	S o Lp
Rueher, Edgar S.	Self.
Bessie M. Craigen	Self.
Martha Baeltcher	Self ✓ <sup>Overland</sup> <del>Overland</del> Park Group
Eliie M. Chudo	Self
Margaret L. Gidding	"
Mary Roulter	"