COMMUNITY INVOLVEMENT/PUBLIC OUTREACH IN LINE CLEARANCE

by Ben Barnes

Seattle City Light, a department of the City of Seattle, is the nation's fifth largest municipally owned utility according to the number of customers served. City Light is supported by revenues from its customers—not taxes; in fact, City Light pays substantial taxes to state and local governments. We at the Utility must never forget that our customers are also the owners of City Light. Each of us at City Light works for them and we owe them the highest professional standard of service in everything we do at the Utility. The Distribution Area Line Clearance Management Program at City Light, under the direction of the Transmission and Distribution Division, began its new reorganized line clearance operations in 1986. Five areas of responsibility were established as guidelines in directing its line clearance operations: 1) to ensure public safety, 2) to maintain electrical system integrity, 3) to help in the enhancement and maintenance of the urban forest, 4) to provide responsive, courteous and reliable service to all customers and to encourage direct public involvement in planning utility activities, programs and services, and 5) to spend our dollars wisely.

Subsequently, after initiating these guidelines in 1986 the respect, credibility and the Utility's public image and awareness as a wholesome and viable member of the urban forest community has changed dramatically to a positive viewpoint in the public perception. With this perception, the line clearance program is better able to "Serve Seattle and its surrounding communities with Light, Power and Pride" a personal goal and Utility standard.

In today's urban environment a great need and concern is being expressed by our customers and the public as a whole. First the need is to be informed about what takes place around them within the urban forest structure. Secondly, the concern is to be involved and participate in planning utility activities, programs and services. With this concept of community involvement and public outreach, Seattle City Light's line clearance program has made great strides in improving its system integrity within the urban forest.

Seattle City Light's Distribution Line Clearance Program has a service area size of 131 square miles. Inside of the service area we have 3,000 urban miles of 4 KV and 26 KV distribution lines and 250,000 trees. The system has 83% of these lines on roadside locations with the remaining 17% in rearlot situations. The service area population consists of 627,000 people of which 310,523 are customers. This is broken down into four categories consisting of residential, commercial, industrial and governmental. To maintain this service area, consisting of eight cities plus various unincorporated county areas, we have all line clearance work performed by private contractors. Presently we have Asplundh Tree Expert Company working under a 3-year contract with a present day total of eight line clearance crews. The crews consist of seven 3-person lift crews, one 4-person rearlot climbing crew and one full time supervisor. Our line clearance operation is maintained under four workload elements by City Light line clearance personnel. The workload elements consist of:

**Assigned Routine Area.** This is done by trimming and/or removing of vegetation on assigned quarter sections as prioritized by need. The priority in which the sections are to be trimmed is established by the Department at the beginning of each year. Quarter section maps are issued to the crews in the order of their priority. Routine area trimming will be maintained on a three year cycle.

**Capital Improvement Work Orders.** Work orders for new 26 KV construction, maintenance and line service operations are distributed to contract crews after the line clearance coordinators pro-

vide completed forms, permits and essential paperwork.

**Trouble Tickets.** Vegetation trouble tickets are originated through various sources—the private sector, the Utility or other agencies. A determination is made by the line clearance coordinators whether the trouble is an emergency or a priority. All trouble ticket work is performed by two hotspot crews and scheduled by the line clearance coordinators.

**Emergencies.** Requests for emergency line clearance are normally received by City Light's power control center dispatchers who notify the line clearance coordinator. Other requests for emergency work are investigated by the line clearance coordinator and a determination is made as to what is required and how soon it must be accomplished. All requests for emergency line clearance from within City Light are responded to immediately by dispatching a hotspot crew.

In the enhancement of our operations we found that communication is of the essence in maintaining a good working relationship with our contractors and the community. Starting in 1986 we wrote into our contracts that all line clearance crews and supervisors would have pagers assigned to enhance communication with the Utility line clearance personnel. Today in 1988 to meet our needs in maintaining effective communications, increase efficiency and save costs, mobile phones are required on two hotspot crews, the contract supervisor and all City Light line clearance vehicles. With this we have been able to improve scheduling, emergency call out and community relations as well as increase productivity and budget savings.

**Vegetation trimming and removal.** In 1984 City Light was awakening to the fact that serious problems were abounding within the distribution service area. These problems concerned increased power outages and tree-related incidents caused by vegetation. To correct this problem, positive steps were taken to hire a consultant with knowledge of utility forestry to look at the situation and provide a detailed report on the present line clearance program and to recommend the best way to operate our program. Environmental Consultants, Inc. (ECI) was awarded the contract and the required work was accomplished during the summer and fall of 1985. The results of the study showed substantial flaws in the operation at that time. Required clearances were not being maintained. Improper trimming techniques were being used. Line clearance crews were being used as hotspot crews. Productivity was low and customer relations were almost non-existent. Outages and tree related incidents were abnormally high. The study also revealed vegetation growth rates and the increased planting of non-compatible trees near and under its electrical system. By February 1986 City Light and the City of Seattle approved the recommendations given by ECI.

A timeline was established and City Light began the process of reorganizing its line clearance operations. During 1986 the Line Clearance program was beginning to take form and by February of 1987 the program was under full direction of the Transmission and Distribution Division.

**Vegetation replacement.** In February of 1987 the real success of Seattle City Light's present line clearance program was taking form. General guidelines had been established, contract specifications were enhanced, a detailed record-keeping system was being maintained and, most importantly, community relations and public outreach were in place. During the past several years of reorganization the line clearance program was aggressively establishing communications with various departments, agencies and community groups. In this process we were informing them of the Utility's needs and concerns about vegetation around the electrical system while also listening and gathering information about the needs and concerns that they had about the urban forest that surrounded all of us.

During this initial customer and public involvement process the Utility realized that an ongoing community involvement and public outreach program concerning vegetation around the electrical system should continue and be used as an effective communication and cooperation tool in dealing with urban forest community. Within the City of Seattle a Street Tree Task Force was established in 1986 to develop a procedure for dealing with the immediate and long term conflicts between City street trees and the Utility's electrical system. The Task Force is mainly composed of the Seattle
Design Commission, the City Engineering Department, the Parks Department, City Light and the City Arborist. A plan was developed to attack the problems affecting an interagency maintenance program. Along with this a list of issues to be worked out was developed and several recommendations were made. The recommendations were:

- That a citywide plan be developed based on the Oakland, California model.
- A “City tree” interagency computer program be developed that has the following objectives: a) provide accurate identification of tree ownership and jurisdiction, b) allow scheduling and tracking of tree maintenance, c) create a more efficient use of tree maintenance crews, d) transfer information regarding trees between City departments, e) enhance efforts toward quality tree maintenance, f) provide an accurate and updated tree inventory of all City owned trees, g) provide specific and detailed information for a tree or group of trees regarding species, ownership, maintenance, history, etc. h) create a centralized interdepartmental repository of information required to maintain Seattle’s trees, and i) decrease conflicts between City agencies, property owners and the public.
- To designate a pilot program area to study and analyze street tree problems.

Through cooperation and positive communications with the Urban Forest Community, the Seattle Task Force is continuing to take positive steps in solving one of Seattle’s urban problems.

City Light’s line clearance program efforts in community involvement and public outreach can also be seen in several other areas of great importance to the urban forest community:

1. Strong emphasis was directed at working closely with our line clearance contractor to develop effective and courteous community relations skills with the line clearance crews.
2. Development of a crew manual to illustrate City Light’s line clearance program.
3. Holding community meetings to inform the public of utility operations and cooperated with them to find solutions in dealing with the urban forest structure.
4. Development of “The Right Tree Book”. Our tree managers recognize that each tree is an individual with its own unique characteristics. While many trees contribute greatly to the urban environment others simply don’t take well to City living. Tall growing trees are just not compatible with high voltage power lines. To help our customers choose the right trees for their particular environment and to suggest the best possible placement of trees to avoid trimming and removal problems, City Light is preparing “The Right Tree Book”. This book will be available to customers in the fall of 1988.

5. Joint development of a Community Service booth on line clearance vegetation programs for both Puget Power (a private company) and Seattle City Light. This booth has been used at home shows, seminars, etc.

6. Public service announcements are distributed concerning: 1) vegetation around the electrical system; b) community meetings, c) the dangers to children regarding treehouses near electrical wires, d) dangers of the public trimming trees near high voltage lines, e) the requirements for the public to stay safe distances from the electrical system.

7. The development of a notification process to inform customers and the public on tree trimming operations on their property or within their community.

8. Development of a system wide Citizen’s Tree Replacement Forum. This forum on tree placement within City Light’s distribution service area is a unique concept for the Northwest. The Citizen’s Forum was just recently developed in June of 1988. Community concern over tree removal and tree replacement has been consistent over the life of the line clearance program. The issue has also become a concern for the City at large. Members include representatives of various community districts within the service area, Seattle’s Street Tree Task Force and a diverse section of technical staff from both the private and public sectors.

A scope of work outline was developed to guide the Forum. The Forum’s scope of work shall be confined to establishing a City
Light departmental policy on tree replacement. The following outlines the major issues to be addressed by the Tree Replacement Advisory Forum: 1) implications of adopting a tree replacement policy, 2) development of criteria for tree replacement, 3) tree selection, 4) program structure, 5) funding, and 6) public information/marketing.

Future Growth
City Light has realized that by establishing an active involvement and public outreach program that cooperation, understanding, and solutions will appear to help run a more effective, reliable line clearance program. Seattle City Light’s clearance program looks forward to understanding and developing its position and techniques within the structure of the urban forest. By doing this we will be better able to “Serve Seattle and its surrounding communities with Light, Power and Pride”, a personal goal and a Utility standard.

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Abstracts


Iron is extremely abundant in US soils. Yet iron deficiency is a problem for many plants. To change a soil’s pH, adding elemental sulfur, polysulfides or sulfuric acid is sometimes recommended. A chelated iron should be considered to correct an iron deficiency problem. Materials that work extremely well in alkaline soils (above pH 7.0) are the EDDHA chelates. The EDDHA chelates are 100% stable at pH levels from 4.0 to 10.0. Apply soil applications six inches deep, spaced evenly around the plant. Start about halfway between the trunk and the drip line and extend well beyond the dripline to cover as much of the absorbing root system as possible. Apply iron chelates early in the season. Chelates applied in July or August, after chlorosis is severe, may not produce the desired results.


Machines, like people, last longer when they receive proper care. A careless operator not only increases machine operating costs but can also increase insurance and hospital bills. Read the manual carefully to familiarize yourself with the machine and to promote a safe and productive operation. When your conditions are not average, adjust maintenance practices accordingly. Machines kept under a roof look newer longer. This also increases the life of plastic parts and rubber components, such as tires, hoses and seats. With proper attention to maintenance and good safety practices, your nursery’s machines can work at peak efficiency and your employees will be protected from injury.