

EXHIBIT B-1  
SERVICE TO PUBLIC AND PRIVATE BUILDINGS  
Dakota County

**IN NDC SYSTEM**

Inver Glen Library  
8098 Blaine Avenue  
Inver Grove Heights, MN 55076  
Wentworth Library  
199 East Wentworth Avenue  
West St. Paul, MN 55118  
Inver Grove Elementary School  
4100 East 66th Street  
Inver Grove Heights, MN 55076  
Northern Service Center (under construction) 5 West Mendota Road  
ISD#199  
Pine Bend Elementary School  
9875 Inver Grove Trail  
Inver Grove Heights, MN 55076  
Hilltop Elementary School  
3201 East 68th Street  
Inver Grove Heights, MN 55076  
South Grove Elementary School  
7650 Clayton Avenue  
Inver Grove Heights, MN 55076  
Salem Hills Elementary School  
5899 East Babcock Trail  
Inver Grove Heights, MN 55076  
ALL IN ONE COMPLEX  
Inver Grove Middle School  
8167 Cahill Avenue East  
Inver Grove Heights, MN 55076  
ISD #199 District Office  
2990 80th Street East  
Inver Grove Heights, MN 55076  
Simley Senior High School  
2920 East 80th Street  
Inver Grove Heights, MN 55076  
B-1-1  
Inver Grove Heights City Hall  
8150 Barbara Avenue  
Inver Grove Heights, MN 55077  
IGH Fire Department 2059 Upper 55th Street E Inver Grove Heights, MN 55077  
Henry Sibley High School 1897 Delaware Avenue Mendota Heights, MN 55118  
**Inver Grove Heights**  
Inver Grove Heights Police Department  
8150 Barbara Avenue

Inver Grove Heights, MN 55077

IGH Fire Department 7015 Clayton Avenue Inver Grove Heights, MN 55076

**ISD #197**

Friendly Hills Middle School 701 Mendota Heights Road

Mendota Heights, MN 55118

Heritage Middle School 121 West Butler Avenue West St. Paul, MN 55118

Somerset Elementary School

1355 Dodd Road

Mendota Heights, MN 55118

Mendota Heights Elementary School 1979 Summit Lane Mendota Heights, MN 55118

Moreland Elementary School 217 West Moreland Avenue West St. Paul, MN 55118

Garlough Elementary School 1740 Charlton Street West St. Paul, MN 55118

**West St. Paul**

West St. Paul City Hall 1616 Humboldt Avenue West St. Paul, MN 55118

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South St. Paul City Hall

125 3rd Avenue

South St. Paul, MN 55075

**South St. Paul**

South St. Paul Public Library 106 3 rd Avenue N. South St. Paul, MN 55075

Wakota Arena (School) 141 East 6th Street South St. Paul MN 55075

South St. Paul Municipal

Airport (Fleming Field)

520 Airport Road

South St. Paul, MN 55075

(shall be considered a subsequently designated building pursuant to Section 6(2) of this Franchise)

**Lilydale**

Lilydale City Hall

855 Sibley Memorial Hwy

Lilydale, MN 555118

**Sunfish Lake**

Sites to be determined

**Mendota**

Sites to be determined

Mendota Heights City Hall 1101 Victoria Curve Mendota Heights, MN 55118

Mendota Heights Fire Department

2121 DoddRoad

Mendota Heights, MN 55120

**Mendota Heights**

Mendota Heights Police Department 1101 Victoria Curve Mendota Heights, MN 55118

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**South St. Paul Schools**

South St. Paul High School

700 2nd St. N.  
South St. Paul, MN 55075  
District Office  
104 5th Ave. So.  
South St. Paul, MN 55075  
ECFE  
1549 5th Ave. So.  
South St. Paul, MN 55075  
Lincoln Center  
357 9th Ave, N.  
South St. Paul, MN 55075  
Kaposia Education Center  
1225 1st Ave. So.  
South St. Paul, MN 55075  
ALC  
151 6th St. E.  
South St. Paul, MN 55075  
Convent of the Visitation School 2455 Visitation Drive Mendota Heights, MN 55120  
St. Croix Lutheran High School 1200 Oakdale Avenue West St. Paul, MN 55118  
St. Joseph's School 1138 Seminole Avenue West St. Paul, MN 55118  
St. Thomas Academy 949 Mendota Heights Road Mendota Heights, MN 55120  
**Private Schools**  
Emanuel Lutheran School 115 Crusader Avenue West St. Paul, MN 55118  
St. John Vianney School 1815 Bromley Street South St. Paul, MN 55075  
St. Michael's School 335 E. Hurley Street West St. Paul, MN 55118  
Holy Trinity School 745 - 6th Avenue S. South St. Paul, MN 55075  
**Colleges**  
Inver Hills Community College  
2500 East 80th Street  
Inver Grove Heights, MN 55076  
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#### EXHIBIT C DESCRIPTION OF SYSTEM

1. The Cable System shall be designed, constructed, routinely inspected, and maintained to guarantee that the Cable System meets or exceeds the requirements of the most current editions of the National Electrical Code (NFPA 70) and the National Electrical Safety Code (ANSI C2). In all matters requiring interpretation of either of these codes, the City's interpretation shall control over all other sources and interpretations.
2. General Requirements. Grantee shall use equipment used in high-quality, reliable, modern Cable Systems of similar design.
3. General Description. The Cable System shall provide Subscribers with a technically advanced and reliable Cable System. The System shall have at least 750 MHz of bandwidth capacity, capable of delivering approximately 80 analog channels of programming. The System will be two-way active, and it will be designed to have

capability to transmit return signals upstream in the 5-40 MHz spectrum. The design will provide the benefits of proven 80-channel electronics while positioning the System for expansion of bandwidth and channel capacity as technology and future services develop.

4. Design. The design of the System shall be based upon a "Fiber to the node" architecture

that will deliver the signals by fiber optics directly to each neighborhood. Grantee's initial design includes a minimum of six (6) fibers to each node site having a neighborhood group average of approximately five hundred (500) homes. If Grantee splits nodes into smaller sizes, fewer fibers will extend to such smaller nodes. There shall be no more than seven (7) active amplifiers in a cascade from each node to the residential dwelling. The incorporation of stand-by power supplies, strategically placed throughout the system including all hubs, will further reduce the likelihood of service interruptions.

5. Technical Standards. The System shall meet or exceed FCC requirements. In no event

shall the System fall below the following standards:

a. The System shall be capable of meeting the following distortion parameters:

1. Carrier to RMS Noise 48 dB
2. Carrier to Second Order 53 dB
3. Carrier to Cross Modulation 51 dB
4. Carrier to Composite Triple Beat 53 dB

b. The frequency response of a single channel as measured across any 6 MHz analog channel shall not exceed +/- 2 dB.

c. The frequency response of the entire passband shall not exceed  $N/10 + 2$  dB for the entire System where N is the number of amplifiers in cascade.

d. The System shall be designed such that at a minimum all technical specifications of this Franchise Agreement are met.

e. The System shall be designed such that no noticeable degradation in signal quality will appear at the Subscriber terminal.

#### EXHIBIT D

#### MINIMUM I-NET PERFORMANCE STANDARDS

##### Signal Quality

The Institutional Network shall achieve the performance standards listed below, where applicable for fiber and/or fiber/HFC-based transmissions, under worst-case conditions for communications occurring between:

- Any institution to any institution
- Any institution to hub or headend and vice versa
- Any institution to any subscriber and vice versa

For Institutional Communications Incorporating HFC Infrastructure

· Noise and Distortion Performance - Under worst-case channel loading (including both analog and digital signals), the combined upstream and downstream performance of the system shall meet or exceed the following:

Carrier to noise ratio = 45 dB or better Carrier to composite triple beat = 55 dB or better

Carrier to second order distortion = 55 dB or better - Carrier to cross modulation = 55 dB or better

· Data Communications - For any data communications link on the network, the

Network shall provide the capability for a Bit Error Rate (BER) to be equal to or better than  $1 \times 10^{-9}$ , except where the link is 50% or more coaxial cable, the BER shall be equal to or better than  $1 \times 10^{-8}$ . This standard shall be met or exceeded under Normal Operating Conditions. Outage times shall not be considered for purposes of determining compliance with the BER prescribed in this paragraph.

- Network Availability - For each user of services on the network, network availability shall be equal to or better than 99.965% (no more than 184 minutes of network downtime per user) as measured on an annual basis.

- Signal Level Variation - The worst-case signal level variation (peak to valley) shall be better than or equal to  $N/10 + 2$  (where "N" equals the number of RF amplifiers in cascade from the HFC node).

For End-to-End Fiber-Based Institutional Communications

- Optical System Noise Performance - Under worst-case link loss as measured for any voice, video or data service, the combined upstream and downstream performance of the system shall meet or exceed the following:

- Signal to noise equals 60 dB or better for links that utilize Grantee supplied equipment. For all other links, the network shall be capable of providing a signal to noise of 60 dB or better, dependent upon end-user equipment.

- Optical Received Power Level at the Institution - For all links that utilize Grantee-supplied equipment, the optical power level for any service delivered to the designated demarcation point at each I-Net user location shall meet or be better than 0 dBm and shall, in all cases, enable operation within the equipment manufacturer's minimum specifications. For all other links on the network, I-Net users shall be able to satisfactorily employ non-custom network transmission and reception equipment, and the I-Net shall enable operation within the manufacturer's minimum specifications for such equipment.

- Network Availability - For each user on the network, network availability on the backbone or for fully redundant, diverse path connections from hubs to user sites, shall be equal to or better than 99.99% (no more than 53 minutes of network downtime per user) as measured on an annual basis. For each user on the network, network availability for standard connections from the hub to the user site shall be equal to or better than 99.965% (no more than 184 minutes of network downtime per user) as measured on annual basis. For purposes of this Exhibit D, the network shall be defined as "unavailable" under the standards herein for any given user when such user: a. Cannot, because of a network problem, measured by SNMP software or other appropriate software and associated hardware, or through a failure of a Grantee-provided interconnect, transmit video, voice and/or data communications to, from, and/or on the network. Such problems shall be the result of a failure of one or more of the following: 1) the fiber optic cabling, connections and transmission equipment on the network and/or the coaxial cabling, connections and RF transmission equipment on the network; 2) the transmission equipment at Grantee's headend; 3) the transmission and network equipment at the customer's premise (if such equipment is provided by Grantee); 4) network powering systems; 5) the network equipment, connections and cabling, network management, hardware and software, and related equipment provided by Grantee at Grantee's headend; and/or 6) any other Grantee-provided transmission or network component; and or, b. Experiences, due to a network problem, video, voice and data transmissions that are below the standards set forth in this Franchise and/or this Exhibit; and/or, c. Experiences, due to a network problem, a data communication packet loss of greater than ten percent (10%). For purposes of this availability standard, network problems shall not be defined as: infrequent scheduled preventative maintenance as long

as I-Net users are notified well in advance, according to the provisions of the Franchise. Except as otherwise provided for herein, network availability is subject to the force majeure provisions of the Franchise and those conditions which are not within the control of the Grantee.

Network downtime shall include, but not be limited to, network failures caused by: third party actions; commercial power outages of a typical, non-catastrophic nature; and power failures and other disturbances caused by weather occurrences typical to the Twin Cities area. Grantee shall comply with the requirements of Demand Maintenance/Service and Repair to restore service following any of these occurrences. Grantee will give the City, the Commission and affected I-Net users notice in the event of any of the foregoing occurrences.

· Data Communications - For any data communications link on the network, the Bit Error Rate (BER) shall be equal to or better than  $1 \times 10^{-9}$ . This standard shall be met or exceeded under Normal Operating Conditions. Outage times shall not be considered for purposes of determining compliance with the BER prescribed in this paragraph.

#### Service Response

Network Maintenance - Grantee shall be responsible for the ongoing maintenance and performance of the I-Net from the demarcation point within a facility through the network, including the I-Net headend. Routine and preventive maintenance shall be performed continually on the network to ensure that it meets all performance criteria detailed herein.

Specific Performance Oversight Responsibilities of the Grantee will include:

(1) Monitoring the operation of the fiber based transport backbone in conjunction with I-Net

users;

(2) Performance and fault monitoring of the transport backbone and distribution system in

accordance with same terms and conditions referenced in Section 7, I.e.;

(3) Monitoring of selected parameters and tables to allow for early identification of potential

service problems;

(4) Monitoring and analyzing I-Net performance; and

(5) Logging and reporting, as required, of data gathered from above monitoring activities.

Preventive Maintenance/Service Interruptions - I-Net users will be notified at least seven days in advance of any scheduled maintenance that may interrupt service on the I-Net, unless I-Net users agree to waive such time frame. Where possible, such maintenance will be scheduled at times of low usage. Demand Maintenance/Service and Repair -

Response to all network problems shall occur at all hours (24 x 365). Specifically, when Grantee receives a trouble call or alarm, either by internal monitoring or by City,

Commission or user personnel, the Grantee's Network Operations Center will ensure that appropriate technical support shall respond within 10 minutes after receiving a call related to a network problem (under Normal Operating Conditions the initial page to the technician on call for I-Net problems will be within the 10 minute time frame). The Grantee shall then work continuously until the problem is resolved.

Network Support - Grantee shall provide an appropriate complement of administrative, headend and field personnel at all times to meet the performance criteria detailed herein.

Service Call Processing and Tracking - Grantee will establish mechanisms and procedures for all I-Net users to quickly and easily report System problems. All trouble

or service calls will be documented, processed, and completed in an expedient manner. Documentation will include monthly I-Net service call reports, as required, which will include a breakdown of reasons and resolutions as well as call handling efficiency. Notwithstanding the staffing, testing and equipment and response requirements set forth herein, the Grantee will provide the in-house and/or contractor staff, spare and back-up equipment, test and maintenance equipment and additional steps necessary to ensure that the network performs reliably in accordance with all standards detailed herein.

#### Network Performance Testing

Proof of Performance - Proof of performance testing will be conducted on the I-Net two (2) times per year at the same time residential subscriber system testing is performed during the months of January/February and July/August. Several geographically diverse I-Net test point locations for each ring and an additional test point per node will be established which are representative of worst-case performance for the area. Testing shall be completed at the mutually agreed upon entry demarcation point at the institution. All active channels upstream and downstream shall be tested at each test point location. If the testing will subject such channels to service interruptions, Grantee will work with Users to schedule the testing so as to minimize its impact upon the Users. Testing shall be performed to ensure compliance with all the network performance specifications included in this Appendix and applicable Service Agreements. Tests shall be performed using standard test methodologies, as mutually agreed to by the City, the Commission and Grantee.

Power Supply Inspections - All network power supplies and back-up devices will be continuously status monitored and manually inspected at least twice per year, which will include the following checks and tests:

- Full load transfer and runtime test
- Battery condition and maintenance check, including replacement if required
- Status monitoring functional test

I-Net User Location Performance Testing - All network performance specifications shall be met at each I-Net user location, and the network shall at all times enable I-Net user video, voice and data

communications to be successfully transmitted in accordance with the reliability and availability standards incorporated herein. Grantee shall schedule with each user such testing as required to ensure successful network performance at each I-Net user location.

Physical Network Characteristics - The physical and electrical configuration of the I-Net will comply with all applicable Federal, State, and Local requirements. Inspections of all cable runs and components will be made by Grantee during the I-Net construction process to ensure the integrity of the network and Grantee shall keep records thereof.

Performance Documentation - All tests and checks will be documented and, upon request, filed with the City and the Commission. At the City's or the Commission's request, all testing processes may be conducted under the observation of a representative from the City or the Commission.

All network performance standards herein relate to Grantee-supplied transmission and network, facilities, infrastructure, equipment and other components.

## EXHIBIT E

### FRANCHISE FEE PAYMENT WORKSHEET

Revenue Source Number of Subscribers Gross Revenue 5% Franchise Fee YTD  
Basic and Satellite, Service, Cable Guide, Equipment Rental, High Speed Data,  
Installation and Service Calls, Interactive Program Guide, Late Fees, Music Choice,

Pay-Per-View

Premium, PEG Fee, Advertising, Shopping, Other Income, TOTAL

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REVENUE SOURCES INCLUDE:

INSTALLATION & SERVICE CALLS:

Standard Installation Additional Outlet, VCR, Reconnection of Service, A/B Switch Relocation

Non-Standard, Change of Service Other Service Calls, Commonly occurring normal Installation, Installation on additional sets within a customer's home, Installation of converter to a VCR Reconnection of cable to a customer's address, Separate Installation of an A/B Switch

Moving an outlet within a customer's home, Usually Installation of a commercial type of an

Account, Charge for upgrading or switching a premium service, Any service calls for which customers are charged a fee

BASIC AND SATELLITE SERVICE:

Basic Service Bulk Rates, Reduced Promotional Basic, Revenue derived from basic and satellite service Revenue derived from non-standard billings (i.e., apt. complex), Revenue derived from a discounted basic and satellite service, PAY-PER-VIEW: All Movies Events

Revenue derived from pay-per-view movies Revenue derived from special events (i.e., concerts, boxing matches, etc.), OTHER: Returned Check Fees Pre-wired Cable Purchases

Antenna Rental A/B Switch Late Fee Revenue derived by Grantee from charges on returned checks Revenue generated from the sale of cable to individuals who pre-wire their home, Any revenue derived from renting space on tower, Revenue generated from sale of an A/B Switch, Revenue generated from receiving a late fee

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OTHER: DOES NOT INCLUDE: Reimbursements, Revenues from the Department of Transportation or other government entities for mandatory relocations of cable system. Revenue from employee reimbursements for cash advances.