

ITS Midwest



Intelligent Transportation Society of the Midwest
Illinois, Indiana, Kentucky, and Ohio

MULTI-AGENCY COMMUNICATION NETWORKS How To Begin?



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STOMP before you start

- ▶ **S**tandardize
- ▶ **T**echnology
- ▶ **O**perations
- ▶ **M**aintenance
- ▶ **P**olicy

Standardize and Specify

- ▶ **Cable and Installation**
- ▶ **Connectors and splices**
- ▶ **Testing and acceptance policies**
- ▶ **Documentation**
- ▶ **GIS Information Recording and storage**

Recommendations

- ▶ **Single mode cable**
- ▶ **As many strands as you can handle**
- ▶ **Fusion splice any permanent connection**
- ▶ **Keep your Documentation and GIS current**

Technology

- ▶ Network Topology
- ▶ SFPs
- ▶ Switches
- ▶ IP Schemes
- ▶ Security
- ▶ Video management system
- ▶ Network management software
- ▶ Network monitoring software

Recommendations

- ▶ Redundant rings
- ▶ Managed switches
- ▶ Create your IP scheme early in the process so you don't have to reprogram when you run out of numbers
- ▶ Use layer 3 switches to isolate the segments of the network and to protect areas that require extra security
- ▶ Always include IT Department in all security related decisions

Recommendations

- ▶ **Video Systems create a whole realm of decisions**
- ▶ **Determine what VMS system will meet your needs**
- ▶ **Decide on who has priority control on cameras especially PTZ**
- ▶ **Will you tape your video**
- ▶ **How long will you store it**
- ▶ **How will it be shared**

Operations

- ▶ **Standard Operating Procedures**
- ▶ **GIS Mapping**
- ▶ **Decision making**
- ▶ **Funding and Billing**
- ▶ **Access Security - Keep IT Department Happy**

Recommendations

- ▶ **SOP for reporting changes**
- ▶ **Decide on a person to make decisions on daily operations**
- ▶ **Have a funding and billing agreement in place**

Maintenance and Monitoring

- ▶ **Maintenance procedures**
- ▶ **Upgrades and improvements**
- ▶ **Trouble and repair calls**
- ▶ **Real time monitoring of the network**

Recommendations

- ▶ Define who will be responsible for system maintenance and repairs
- ▶ Define how decisions will be made on system upgrades and improvements
- ▶ Plan for system monitoring to help with troubleshooting and determining if a cable has been cut

Policy

- ▶ Right of Way usage
- ▶ Maintenance Agreements
- ▶ Operations Agreements
- ▶ Financial Agreements
- ▶ Dark Fiber Policy
- ▶ Video storage and access policy

Recommendations

- ▶ **Have a Right of Way policy that allows for compensation for usage (if allowed)**
- ▶ **Have a Maintenance Agreement in place that defines all participants financial and personnel involvement**
- ▶ **Decide what the qualifications are for use of your dark fiber and how they will be applied**
- ▶ **Clearly define how long video will be stored, how access will be allowed, and the process for making it available**

Recommendations

- ▶ Be aware of all of the requirements of grants and make sure you meet those requirements
- ▶ Create a *Master Plan* that will be used to guide you through the process and has the requirements built in



Questions ???

Thank you

Contact Information



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