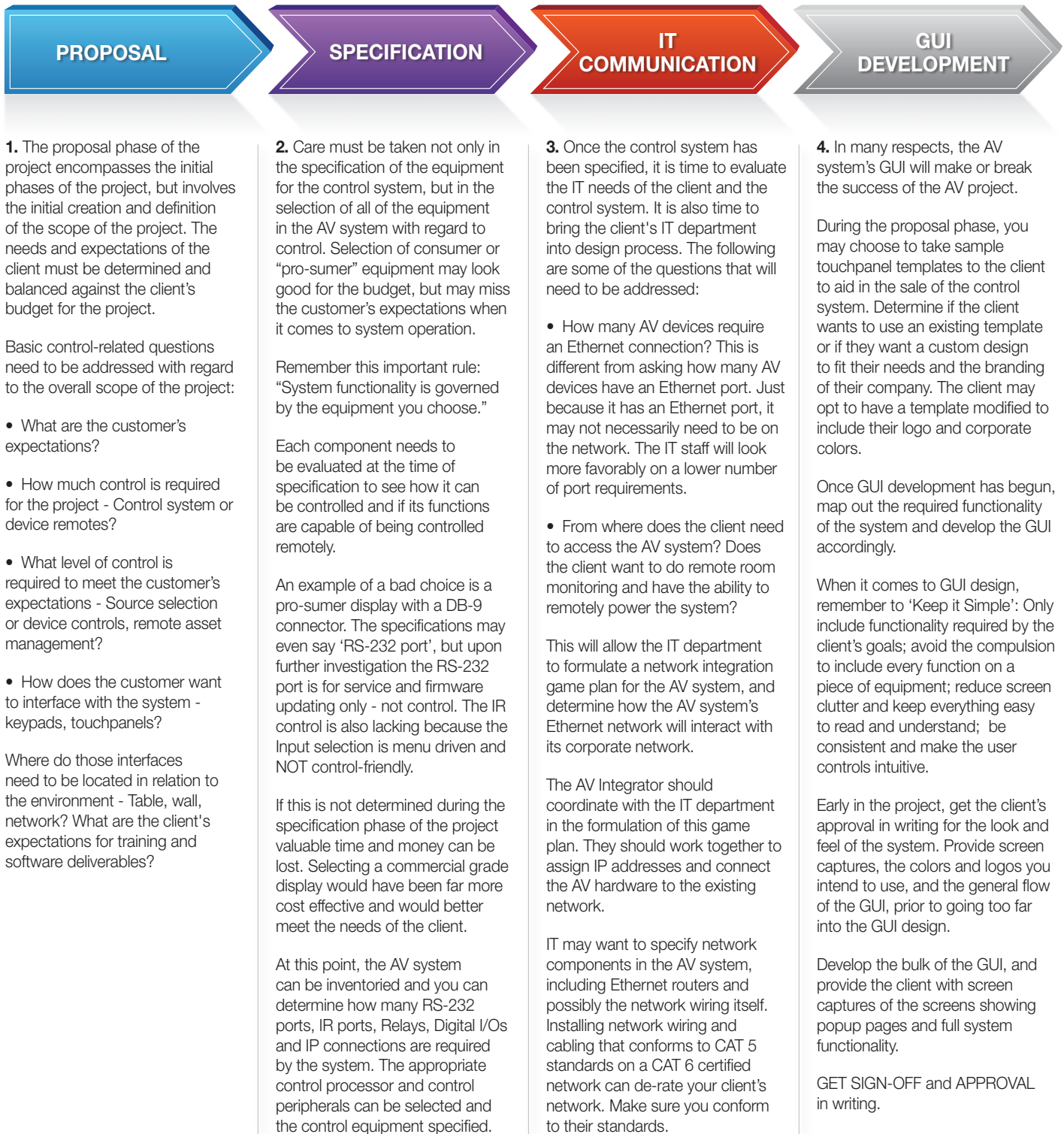


Understanding the Control Project Timeline

The AV Project Lifecycle from a Control System Design Perspective



How Extron supports you every step of the way.

Proposal, Specification, IT Communication: AV Consultants and Engineers call for help on system design and product details to use in defining the scope of projects. Extron Engineers help customers choose the right products and provide system design drawings for their applications. Also, Extron Engineers help IT departments develop a game plan for how the AV devices in the Ethernet network will interact with the corporate network.

GUI Development, Configuration/ Programming: In addition to the Extron GUI Resources Web page, GUI reference guides, and TouchLink themes, Extron also offers a GUI Modification and Customization Service, which

CONFIGURATION/ PROGRAMMING

5. Ideally, the time and effort placed on the front end of the project will pay dividends during the configuration and programming phase of the project. The AV system's equipment is known to be controllable, and expectations have been firmly established during the GUI Design phase. IP addresses for any Ethernet-enabled devices should have been provided by the client's IT department.

You will need to have all of the project documentation at this point. Typically, you will need one-line diagrams for the audio, video, control, and networking components of the system. Depending on the size and the scope of the project, these diagrams may be individual drawings or the drawings may be combined.

Test the components of the system throughout the configuration/programming process. AVOID trying to configure the entire system and test it all on-site. Develop a dry lab testing process to simulate the system prior to taking it to the client. The use of a control processor for testing purposes will pay dividends in the eyes of your installers and your client, when your systems just work out of the box.

AVOID trying to do it all when you get to the job site. Wiring and testing the system in a controlled environment will do wonders to reduce your stress levels, increase the reliability of your systems and improve customer satisfaction.

INSTALLATION

6. Coordination between sales persons, engineers, control system developers, and installers must occur throughout the lifecycle of an AV project. Successful projects require a team approach to meeting the expectations of the customer, but the talent that is performing the installation must be the benefactors of great planning. Depending upon the complexities and the demands of a project, AV installers may need the configuration and GUI files prior to taking the AV equipment on-site.

As AV systems become more complex, installers interact more and more with IT. The installation crews will need to be trained on how to set up and address the AV equipment and the control system hardware.

The installation crews need to coordinate the needs of the control system components with the customer's IT department to obtain IP addresses for network enabled devices. Installation crews should also be familiar with basic network diagnostics to check network connectivity and to verify addressing prior to the installation of the control system.

The control system should overlay a fully functional AV system. If you are unable to send a signal from Point A to Point B without the control system in place, then you won't be able to send the signal down the same path with the control system operating.

COMMISSIONING

7. The commissioning phase of the project varies from project to project. Ideally, there is an internal commissioning, where the AV installers and the control system designers coordinate to debug and test the functionality of the AV system.

The key to successful commissioning is teamwork and coordination with the installation crew. Both hardware and software experts should work hand-in-hand to identify and solve system issues.

The job should be approached in a simple and logical fashion to test all aspects of the AV system. Deviations from the construction drawings should be noted and recorded for the record issue drawings. Files should be commented and renamed for proper revision control. Bugs and system changes should be documented and remedied prior to presenting the system to the client.

You should decide well in advance who will provide training to the client. Oftentimes the salesperson or the project manager may have the best relationship with the client and will be responsible for the training. Significant questions by the trainer may indicate a flaw in the user interface design that was not identified in the GUI approval phase, and may require last minute adjustments to the GUI.

If a consultant designed the AV System, the system will need to go through another walk-through and testing phase with the consultant prior to the presentation of the system to the client.

SIGN OFF

8. The ultimate goal of the project is to present the system to the client for final training and sign-off. Screen captures of the final GUI should be provided for the development of a system manual, and system drawings will need to be updated for 'As-Built' drawings. Final versions of the software should be delivered to the client along with the system documentation in accordance with the original contract agreement.

Sign-off should be documented in writing to avoid future misunderstandings, and a procedure should be put in place for the reporting of any bugs and for the warranty of the hardware and software of the AV system.

helps customers develop interfaces that balance function, style, and ease-of-use. For configuration help, Extron Engineers are standing by, and can even remotely access your computer to work directly with you on projects.

Installation, Commissioning, Sign off: Installers call from the job site for help with AV system installation, and Extron Engineers review the system needs and provide guidance for optimal performance of the AV and Control System. Extron also provides commissioning services for some software products, which includes system evaluation and diagnostics, installation, setup and configuration, testing and system documentation. Remember, Extron's Satisfaction Guarantee states that we will work diligently to resolve any issue you have with your purchase until you are completely satisfied.