

Systems Engineering

Detailed Design Evaluation

	Missing	Poor	Fair	Good	Excellent
System Description	No system description present	Minimal system description	System description is very unclear or has significant omissions	System description is a little unclear or some aspect is missing	Description of the system is clear and concise giving the reader a clear idea of the project
Drawings/ Diagrams	No drawings present	Drawings provide virtually no information to help the builder	Drawings have significant omissions, making it difficult for a manufacturer to build	Drawings are unclear in some minor area	Drawings give clear description of the system and include units so that a 3rd party can build it easily
Temporal Model	No temporal model present	Minimal temporal modeling	Significant omissions in the temporal model	Temporal model is missing on minor aspect	A clear temporal model (like a flow chart or state diagram) is present and supports the concept of operations
Assembly Instructions	No assembly instructions present	Instructions do not help assemble the system	Instructions ok, but there are some significant issues	Instructions are pretty good, but some areas are problematic	Assembly instructions are clear and make it easy for a 3rd party to build your system
Installation Instructions	No installation instructions present	Instructions do not help install	Some significant areas missing or unclear	Some small aspects of the installation are missing or unclear	Installation instructions clearly describe how the system will be installed at the museum. A 3rd party should be able to do easily the installation with these instructions.
Bill of Materials	No bill of materials present	Minimal bill of materials that is not particularly useful	Significant holes in the bill of materials	Bill of materials is missing some minor areas	Bill of materials clearly specifies all parts and sources used for constructing the system
Fault Recovery	Fault recovery not addressed	Minimal description of the fault recovery	Some major fault states missing	Some minor fault states missing	There is a clear description of how faults will be handled and of any degraded operational modes of the system
Traceability	No traceability to requirements and conceptual design	Only minimal traceability present	Many areas are not traceable back to requirements	Traceability is mostly present, but some areas missing.	There is very clear traceability from design decisions to the underlying requirements
Engineering Practices	Document does not contain a revision history or any referencing	Document is either missing a revision history or nothing is referenced.	Document contains a revision history and some references exists, but they are minimal.	Document contains a revision history but references are a little light	Document contains a revision history, and proper references to both external documents and internal sections
Readability/ Organization	Document is a jumble and impossible to follow	Document is legible, but there are many spelling, grammatical or logical errors making it very difficult to follow.	Organization of document is confusing or prose is too convoluted, making the document more difficult to read and understand	Document is well organized, but there are some areas that are confusing. Also, document could be too long and repetitive.	There is a logical flow to the document and prose is clear and concise.