

A Report On IT Communication

Liam Daniell
Writing for Work Fall 21

Table of Contents:

<u>Abstract</u> - pg 3
<u>Introduction</u> - pg 3
<u>Results</u> - pg 4 - 6
<u>Discussion</u> - pg 7 - 8
<u>Conclusion</u> - pg 9
<u>References</u> - pg 9

Abstract:

This report talks about the many different skills both Hard and Soft that an IT professional would need to be able to effectively and efficiently complete their IT duties. Ranging from the technical knowledge and program proficiency that is needed to the writing and communication skills that are used to interact with those within the IT field and outside of it.

Introduction:

To make it in the IT world you need more than the technical knowledge and knowhow that you have learned. Being able to effectively communicate with your IT peers and those outside of your field is a must. Hard skills like ticket systems, hardware/software certifications, and programming proficiency give you the ability to do your job. But Soft skills like collaborating, and being able to write different technical reports like project charters, End-User Documentation and Work-Breakdown structures make sure your job is done in the way that puts both you and your work's best foot forward.

Results:

Hard Skills:

1. Ticket Systems (*Freshservice ITSM System*) - Ticket Systems or Issue Tracking Systems(ITS) come in many different forms depending on your company's needs. Examples are Freshdeck, Freshservice, and Servicedesk. Ticket Systems help you keep track of problems that happen on your network. The 4 main types of tickets that come up are:
 - Events - Record of things that have happened in your IT Environment. Ex: Outages, and Planned Changes
 - Alerts - Indicator that something might have happened in your IT Environment or is not working as expected.
 - Incidents - Unplanned interruptions, reduction in quality, or failure of a component in your IT Environment. All incidents correspond with an Event.
 - Requests - Routine IT activities. Ex: User requesting access, resetting passwords/emails, updating services.

Tickets that show up in your Ticket System are generated in 3 main ways:

- System Generated - ITS have monitoring and Error Handling capabilities that automatically record tickets when unusual events occur.
- User Initiated - Users request support with a service/product through email, link, or self-service portal.
- Agent Generated - Helpdesk employees record tickets for later help from IT staff.

To manage and classify Tickets on your system 4 main criteria should be used:

- Type - Whether the ticket is an Event, Alert, Incident, or Request.
- Source - How the ticket was generated either System, User, or Agent.
- Priority - How important is the ticket to IT operations.
- Criticality - Time sensitivity of the ticket.

2. Programming Proficiency (*Top Programming Languages*) - Depending on the type of IT work you are performing different types of programming languages are needed:
 - App Development - Java, C#, Swift
 - Web Development - Python, JavaScript, C#, PHP, HTML, CSS
 - Databases - R, SQL
 - Server/Operations Development - C/C++, Golang,

Soft Skills:

3. Technical Reports (*Project Management Docs*) - The types of technical writing IT professionals do is generally in the form of reports that have to do with creating new products or services. This can be communicated in a variety of ways but 2 big ones would be Project Charters and Work-Breakdown Structure.
 - Project Charters - Project Charter is a document that includes all the information about a project you are starting. Including information like project leader, schedule, budget, need. It can be broken down into a five-paragraph document but more information can always be included.
 - Paragraph 1 - Formally authorize and summarize the project
 - Paragraph 2 - State scope of project, deliverables, and potential problems
 - Paragraph 3 - Identify Project lead and give authority to use resources
 - Paragraph 4 - Provide milestone schedule
 - Paragraph 5 - Project Budget
 - Work-Breakdown Structure - Work-Breakdown Structure(WBS) is a way to visualize the work that a project encompasses and is an easy way to communicate the work to those outside the IT field. A WBS has many different ways that it can be visualized in which include:
 - Outline View
 - Hierarchical View
 - Tabular View
 - Tree Structure View
 - WBS Dictionary

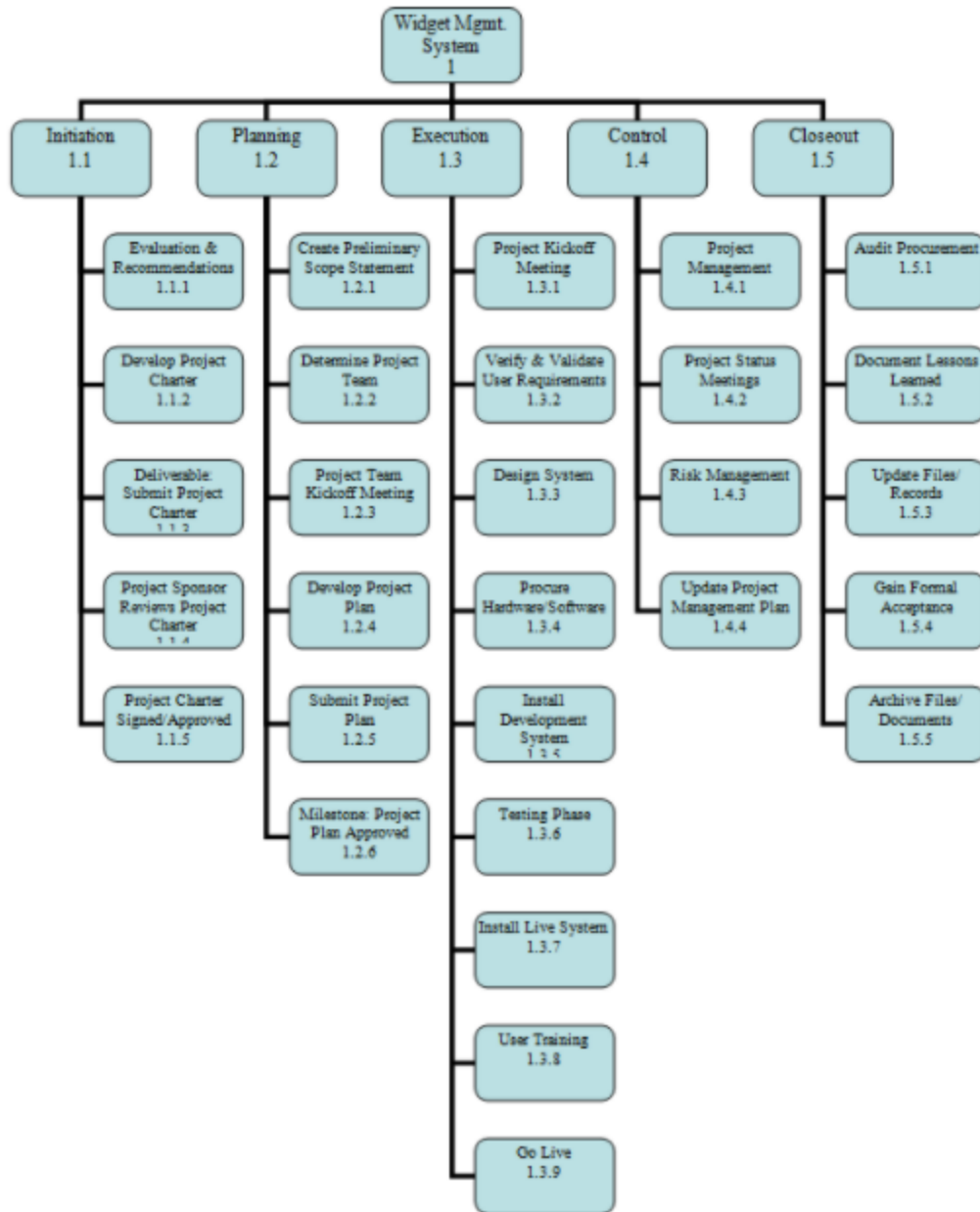


Figure 1: WBS Tree Structure View

Discussion:

Hard Skills:

Ticket System - Learning what Ticket Systems are and what they do is very important if you are going into an IT job that focuses on Networks or some sort of data security. This can be working in an office or a school for example. This is the go to type of work that people visualize when you say you are working an IT job.

Understanding the 4 main types of tickets there are in Ticket Systems, how they are generated and what the ways they are classified is necessary in order to be an IT Professional.

Events tickets help keep track of all of the things that go down in your Ticket System. Whether or not they are intentional things or unplanned. Alert tickets help make you aware of problems that may be occurring in your IT network or services that aren't acting the way that they should. Incident tickets are unplanned interruptions to your IT network like when the school/business's wifi or services drop in quality. Request(support) tickets are probably the most common ticket that happens and include daily IT tasks like when a coworker needs a computer set-up, mouse replace, password reset, etc.

Knowing the ways tickets are generated is also useful because it allows you to know what the sources are and potential causes for them. System generated tickets usually come from some sort of automated monitoring or error handling program in the Ticket System that makes tickets and sends them whenever an unexpected issue arises. User initiated tickets come from users that email, or click on a link or some type of portal that has been set-up to get in contact with an IT professional to get their problem solved. Agent generated tickets usually come from a support desk where the employees there create a ticket and send it to the IT department for them to solve the issue that a customer or user has submitted to them.

The criteria to managing and classifying the tickets that come from your Ticket System keep a better track of the tickets that you have. The type of ticket is whether it's an Event, Alert, Incident, Request, or any other ticket types that you may have. The source of the ticket is where it came from either System, user, or Agent generated. Priority of the ticket is how important is this ticket to running IT operations or the business. Tickets with a higher priority should be completed before ones with lower priority. Criticality of the ticket is the time sensitivity of it. Unplanned outages that render your company

unable to do business should be completed faster than your coworker needs a new mouse for example.

Programming Proficiency - Which programming language you use is entirely dependent on what the IT work you are doing is. If you are in web development you need to be proficient in languages like javascript, CSS, and HTML but you don't really need knowledge in something like SQL for example because that is used for database coding. Learning one coding language helps make learning other ones easier because once you know one the only thing you really have to learn about the others is how the syntax changes between them.

Soft Skills:

Technical Reports - Learning Technical Reports like Project Charters and Work-Breakdown Structure is very important in being able to communicate projects that you may be in charge or a part of to other members of your IT team and the organization/business that you work for. The Project Charter is a document that contains all the information of the project that may or may not be undertaken. It gives a potential budget for the project, a timeline for it, what the project is going to accomplish and how that's determined, the timeline, who is leading the project, etc. This can be put together by someone whose part of the project or the leader of it. So whether or not you are in a managing position it is good to know what the parts of it are and how it is used.

Work-Breakdown Structure is probably the most important document that you can make when you are trying to communicate what the work for a project is to someone that is not in the IT field, your department, or maybe upper management or a stockholder/board member. It allows easy visualization of the different steps that are needed for the project to be completed. It can be as simple as numbering the steps and processes of the project like in the outline view or something like the WBS dictionary that numbers the steps and gives a definition of the work that needs to be done for each step.

Conclusion:

For you to be able to do the best IT work that you can and to be a good communicator to those in your field and those you encounter at work that may not have the same level of knowledge as you. You need to be able to switch between your Hard/Technical skills when working with those in your IT field or department and your Soft/Writing skills when talking to those outside your department, because in doing so you can make sure that your work and projects that you are a part of can go smoothly and efficiently.

References:

Freshservice ITSM system: ITIL-Aligned Service Desk Software. Freshservice. (n.d.). Retrieved September 25, 2021, from

<https://freshservice.com/it-ticketing-software/it-ticketing-best-practices>.

Top programming languages and their uses. KDnuggets. (n.d.). September 25, 2021, from <https://www.kdnuggets.com/2021/05/top-programming-languages.html>.

Free project management templates by Project Management Docs. Project Management Docs. (2021, January 24). Retrieved September 25, 2021, from <https://www.projectmanagementdocs.com/#axzz786R5ejWg>.