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CREATING ACCOUNTABILITY AND INCREASING EFFICIENCY BY IMPLEMENTING AN IT SERVICE MANAGEMENT SOLUTION

Priscilla Leon

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CREATING ACCOUNTABILITY AND INCREASING EFFICIENCY BY

IMPLEMENTING AN IT SERVICE MANAGEMENT SOLUTION

_____

A Project

Presented to the

Faculty of

California State University,

San Bernardino

_____

In Partial Fulfillment

of the Requirements for the Degree

Master of Science

in

Information Systems and Technology

_____

by

Priscilla Leon

June 2020

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Approved by:

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ABSTRACT

Creating a culture that values accountability and efficiency is a difficult

task for any organization. Without metrics or systems in place to help with these

problems, the task becomes nearly impossible. The focus shifts from

accountability to covering your tracks and decreased efficiency are usually

blamed on external factors. In higher education, the problem is far more severe.

Management leadership and staff are accountable to the stakeholders of higher

education, such as the students, community, and faculty. A lack of accountability

and a decrease in efficiency, in the Education Department, have led to a need for

a technological solution that can help mitigate these problems.

IT Service Management solutions are typically used by IT departments.

However, the standards and principles that are followed by ITSM, can be

beneficial to non-IT departments. "ITSM bridges the gap between university IT

and non-IT departments by extending IT Service Management Practices across

campus" (Sankaran, p.7, n.d.). This project implements an ITSM solution into the

Education Department to increase accountability and efficiency. The tools offered

by the ITSM solution are intended to help increase efficiency, communication,

and transparency within the department, thus providing excellent service to the

department's stakeholders.

This project focuses on the importance of accountability and efficiency in

service provisioning. The project investigates the best practices used by leaders

in higher education, the importance of IT Service Management, compares four ITSM solutions, and finally explains the implementation and customization of the solution. The motivation for this project highlights the significance of the problem and the need to solve it. It is also important to understand the workflow of the department prior to the implementation of the ITSM solution and why it needed to be improved. The customization and configuration of the chosen ITSM solution demonstrates the benefits that it can bring to the department. Overall, the project will show how the ITSM software increases efficiency and accountability.

The implementation of the ITSM solution allowed for more accountability due to the records and metrics created within the software. The Education department team can see who is doing what and where others are lacking. It also increased efficiency by providing a resource where all relevant information is in one area. Notes, comments, and activities regarding service requests are kept in the software and it is accessible by everyone on the team. This allows for everyone to spend less time looking for information and more time focusing on resolving the service requests in a timely manner. Thereby, improving the quality of the service provided.

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CHAPTER ONE

INTRODUCTION

Chapter Overview

Accountability and efficiency are difficult to measure and maintain, yet they are very important to the success of any organization. "Accountability means the justification of an activity; it means proving, in the most efficient manner, responsibility for the performance of certain results" (Kai, 2009, p.40). They are especially important in the education industry. Leaders of higher education, faculty, and staff are responsible for providing stakeholders with accurate communication, commitment, accountability, and effective change management.

Although, there are governmental policies and procedures set in place, on a departmental level, universities create their own processes for completing daily operations. These processes have limited reliability on software that can increase accountability and efficiency. Instead things are done following outdated procedures, relying heavily on email, and personal tacit knowledge. An article from the Journal of Higher Education stated that "Governments are increasingly looking to the different sectors of higher education to augment learning skills and improve workers' ability to develop and use technology, thus enhancing productivity and strengthening the state's economic position" (Alexander, 2000, p. 412). The need for improvement on the service level of the Education industry is long overdue and necessary to meet the needs of faculty, students, and prospective students.

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The current COVID-19 pandemic serves as a perfect example for the flaws in the current operations. The Education Department was forced with having to make the change to remote work without any notice. Since there is not a system in place to manage service requests, the staff are forced to rely solely on email communication. This creates a break in communication in the team because, unless emails are sent to all three staff members, we do not know who is handling what requests. Efficiency is decreased due to not being able to document and log any requests. It also creates a greater barrier to accountability since there is no way to determine if everyone is taking their share of the workload. Most importantly, our customers are not getting the best service and attention that they should be receiving from the Education Department due to the abrupt change.

This project focuses on the accountability and efficiency issues of a college department within a public university, herein called the "Education Department". Before describing the current operations of the Education Department and best practices in the education industry, the problem statement is addressed as well as the motivation for the project.

Problem Statement

The purpose of this project is to implement an ITSM solution for the Department of Education to increase accountability and efficiency. The following questions are addressed:

1. How do you increase accountability and efficiency in an office setting using technology?

2. What procedures, processes, and metrics should be used with the IT Service Management solution to help enforce accountability and efficiency?

3. How will the IT Service management solution affect the overall operations of the Education Department?

Motivation

      The motivation from this project stems from the difficulties experienced and noted in the Education Department. When the processes and procedures are broken and unclear, within a department, they lead to situations where staff members are more preoccupied with following the bureaucratic structure rather than serving the mission and values of the department. As an employee of the Education Department, it is extremely important to prioritize the quality of service we provide to our faculty, students, and community. That is in an effort to help them successfully pursue their academic goals.

      According to Roger Gill "New organisational cultures will supplant bureaucratic cultures that are characterised by hierarchy, boundaries, internal orientation, control and the need to avoid mistakes (Hastings, 1993). Bureaucracy is a well-documented hindrance to developing a learning culture." (Gill, 2003, p. 314). Efficiency and accountability are not made a priority and things can begin to fall through the cracks. Sticking to the way that things have

been done in the past is done in the self-interest of job security rather than the desire for efficiency. Further measures to increase accountability are seen as intrusive and untrustworthy. These issues cause internal conflict between staff members and unnecessary delays in completing job duties. It also creates an imbalance in the workload. In the Education department there are three staff members and the shared duties between them are not always distributed equally. Staff members who pick up the majority of the workload are not recognized and staff members who do not contribute go unnoticed.

Additionally, there is no direct or clear source for documentation. Employees do not have the option to search if a task has been completed or what the process is for completing similar tasks. There is no knowledge base where staff can log their methods for completing processes. This creates an issue when employees leave because the new person stepping in has to start from scratch, when it comes to finding ways to complete the job duties. That is not only ineffective, but it is also inefficient. It delays the time to start a job and it creates room for error.

For those reasons, implementing an IT Service Management solution, or ITSM, into the Education department is essential. The ITSM solution can be configured to meet the needs of the Education Department. It will help the administrative staff, in the Education department, increase accountability and efficiency in their daily operations. This will benefit them and the entire department by creating set procedures for assigning and completing work

requests. It will increase communication because there will be a place where staff members can enter and view documentation about work requests. It will also help create metrics to track accountability. This will help improve the workload balance within the department and establish steps to address any issues currently in place. By having a central location to log, access, and monitor work requests everyone will be on the same page. Efficiency will increase and everyone will be held accountable for the work that is completed.

CHAPTER TWO

BACKGROUND AND ANALYSIS

Chapter Overview

This section focuses on the current operations of the Education Department. We also discuss current best practices in the Education Industry. Guidance and examples come from the NIST Malcolm Baldrige Award Recipient Summaries. This section also looks at the service management and more specifically, IT Service Management. Finally, four different service management solutions are compared and the one that best fit the needs of the Education Department is chosen.

Education Department Current Operations

In order to maintain some anonymity, certain details of the Education Department's operations are not disclosed. The Education Department consists of over 60 faculty, over 2,700 undergraduate and graduate students, and three administrative staff. The Department Chair is the supervisor of the department office and the Department is led by the Dean of the College.

The three administrative staff have some separate duties that they complete as well as shared duties among the three. The use of technology is limited to PeopleSoft, the University's main portal, Outlook for email, Google Drive, and an Access Database that stores our graduate student information. The Enterprise Management System set in place by the University, provides access

to complete several tasks such as key requests, printing requests, enrollments, and drops. There are rules and procedures set in place by the University to comply with Government rules and regulations. However, due to the size of the department the internal processes and procedures vary from other departments on campus.

Work requests are submitted either by phone, email, or in person. The staff have an email where faculty and students can send requests and it is sent to all three team members. However, there are several occasions where emails are sent to only one staff member and the rest of the team is not notified. Some work requests can only be completed by certain staff members which leaves other members out of the loop. If a staff member is out of the office for an extended amount of time, the work specific to them cannot be completed until they return. This oftentimes leads to delays for other staff members, faculty, or students. We each keep our own notes and to do lists and rarely communicate on the status of a workload that is in progress. There are several instances where two staff members can be working on the same work request if they have forgotten to reply all on an email or Cc the other department staff.

As can be noted from the processes mentioned above, the Education department does not have an effective system in place to communicate. It also does not have any standards or procedures to keep everyone accountable for the work that is done. Documentation is not easily accessible and instead you have to rely on the notes or comments given by the staff member currently

working on a project. Siloed job duties do not allow for continuation of certain work requests when a person is out of the office. Therefore, another staff member cannot easily pick-up where the other person left off. Instead, they must wait until the person returns to complete the task. In a department with a large number of faculty and staff, there are abundant amounts of work requests that come in throughout the week. When errors do occur or there is a break in communication, an emphasis is placed on who did what and when rather than on how the problem can be fixed.

Best Practices in Educational Institutions

The NIST Malcolm Baldrige Award Recipient Summaries provide great guidance on the best practices in the Education Industry. Topics such as communication, commitment, change management and accountability in the education industry helped guide the implementation of the service management system. Leadership is extremely important in the success of this implementation. Without the support of leadership, the administrative staff will not find the value in using the system, ultimately making it obsolete. The practices followed by the award recipients, provide excellent examples to follow and greatly benefit the implementation of the ITSM in the Education Department.

Communication

When changes occur in an organization, communication is extremely important. Transparency and sharing vital information to employees helps them better adapt to the changes that lie ahead of them. The Malcolm Baldrige Award

recipient summaries recognize those challenge and they present methods that they use in their organization. For example, the Alamos Colleges District emphasized the importance of communication in their workforce change management "We prepare our workforce for potential and actual capability and capacity changes through communication, ongoing development, cross-training, involvement, and teamwork." (2018, p. 26). Communication between the administrative staff and customers will help everyone adapt to the addition of the new ITSM solution into the department.

Knowledge management is also addressed in the education industry best practices. "To ensure all employees and stakeholders know how to find and access information when they need it, we integrate our information and knowledge management approach into our approaches for communications and relationships" (Richland College, 2005, p. 19). The availability and access to knowledge management makes an incredible difference in effective communication. Communication is essential not only in the implementation of the ITSM solution but also in the continuous success of the project.

Commitment

The Malcolm Baldrige Application summaries also emphasize commitment to the faculty, staff and students through their values and mission. For example, Tri County Tech created a culture through their values and mission that help define their commitment to the service they provide to their stakeholders. "Our Vision "inspiring success through life changing learning experiences" is the

aspiration for the work of our organization. Our Mission, "Provide Superior Training," is the foundation of our organization. "The Tri County Way" is our culture and is articulated through our Vision, our Values, and our Core Competencies. Our Core Values are "Who We Are" as an organization. (Tri County Tech, 2018, p. 1). Clearly defined vision, values, and culture will be an important driver in the adoption of the new ITSM solutions. As noted by Roger Gill "shared values are a key feature of a strong organisational culture (that includes beliefs, attitudes and patterns of habitual behaviour) that supports a common purpose and engenders commitment to it" (2003, p.313). The administrative staff needs to be committed to the values and vision of the department in order to accept the reason and need for the new solution.

Key performance indicators or measures are also used to determine whether the commitment to their values and mission are being fulfilled. The values, mission, vision and key performance indicators are what define the service and commitment to the stakeholders in the Education Department. The key performance indicators of the ITSM solution in the education department will be demonstrated in the increase in efficiency and accountability within the department. Through the metrics established by using the software, the leaders and employees can determine if goals are being met. They are also be able to make any needed improvements to stay in line with meeting the vision and values of the department.

<u>Change Management</u>

Change management is a crucial step in the successful implementation of the ITSM solution. "Change programmes often fail because of poor management: poor planning, monitoring and control, lack of resources and know-how, and incompatible corporate policies and practices" (Gill, 2003, p. 308). The support of leadership and constant communication with the administrative staff will help ease the change in workflow. Transparency and workforce participation can also help in any workforce changes that may occur. "Since faculty and staff representatives participate in the planning process they have a forecast of what is coming and can begin to prepare for the needed changes" (Alamos Colleges District, 2018, p.26). Including faculty and staff in the planning process for changes helps them better prepare for the changes that will occur.

Empowering employees to be a part of the change is a necessary step for leaders. "Empowerment is also about involving people in the change process. People are much more inclined to support what they help to create (and they resist what is forced on them)" (Gill, 2003, p. 316). The implementation of the ITSM solution is intended to benefit all the stakeholders involved. The administrative staff benefit by having an improvement in communication, efficiency, transparency, and an easy to access knowledge base. Leaders benefit by having the metrics to determine the department's strengths and weaknesses. Faculty and students benefit by having a better-quality service provided to them.

By empowering the administrative staff and including them in the process the benefits to all stakeholders can be realized.

<u>Accountability and Efficiency</u>

The overall drive for this project is to increase accountability and efficiency. The importance of those features cannot be underestimated. "Accountability means that institutions of higher education must be responsible to the government and external society and that the government may use accountability to exercise guidance over the orientation of operations at colleges and universities and over the focus of their work, and even to strengthen controls over institutions of higher education" (Kai, 2009, p. 47-48). Employees of the Education department are accountable to the faculty, students, and external customers it serves. Without any measures to establish accountability we are not providing the best service we can to our customers. "The practical motivations for higher education accountability are the needs for higher educational reform and development, the most important of which is the large amount of public financial resources needed for the development of higher education" (Kai, 2009, p. 42).

Process Design Model

The Alamos Colleges District provides a Process Design Model in their Malcom Baldridge National award summary (Figure 2.1).
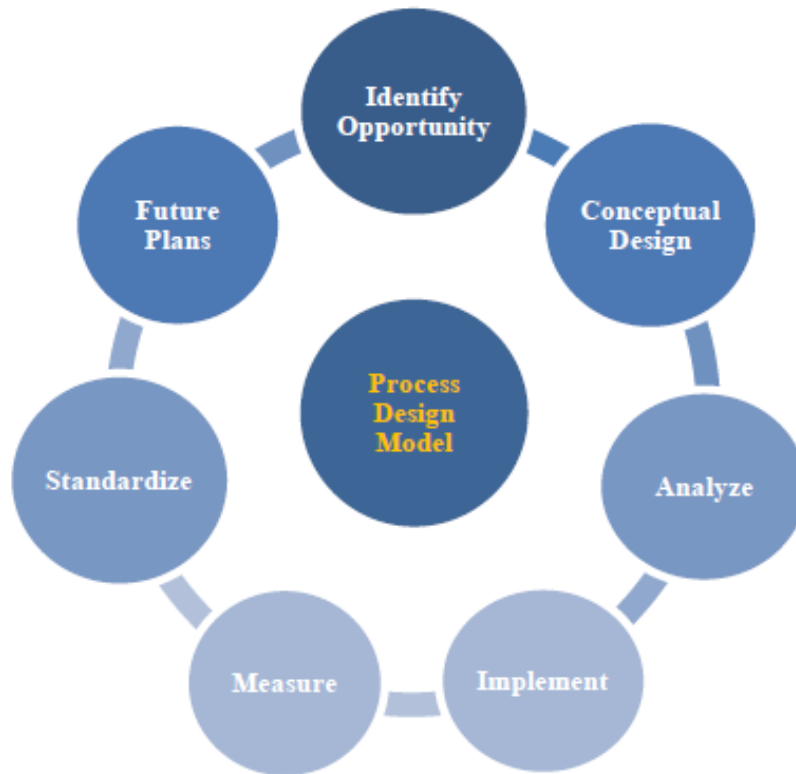
Figure 2.1 Process Design Model (Alamos Colleges District, 2018).

The Process Design Model helped guide the implementation of the ITSM solution into the Education Department. The steps in the Process Design model are configured to meet the needs of the Education Department.

Identify Opportunity

In this step, the goals are to "establish a mission statement to define the need and outcome expected; identify measures and constraints; establish team structure with involvement of process experts and stakeholders" (Alamos Colleges District, 2018, p. 32). For the Education Department the goals are:

- Mission Statement – To increase the accountability and efficiency of the Education Department by implementing an ITSM solution. This will help them better assist our faculty and students in the success of their educational pursuits.

- Identify Measures and Constraints – The measures used in this project include trial installation of the selected ITSM solution and the preliminary configuration of the ITSM software to meet the needs of the Education Department. The metrics established by the ITSM solution, as well as active leader and stakeholder participation, is used to determine the success of implementation. The constraints are limited to the storage and technical requirements needed to implement the software. The ITSM solution that is chosen is cloud based therefore, additional hardware does not need to be purchased.

- Establish Team Structure with Involvement of Process Experts and Stakeholders – The team includes the Department chair and the three administrative staff of the Education Department. The involvement of process experts are limited to the ITSM software customer support for technical questions. The involvement of stakeholders include their service requests submissions to the software our faculty, staff, and external customers. As well as the feedback from the department chair and administrative staff.

<u>Develop Conceptual Design</u>

In this step, the following elements are identified to develop the conceptual design of the ITSM solution into the Education Department:

- Identify Customers and Stakeholders: The Education Departments three administrative staff, Faculty, students, and external customers (such as prospective students), and the Department Chair.

- Identify Customer Needs and Expectations: The need and expectations of the customers is to receive excellent customer service from the administrative staff in the Education Department.

- Translate Needs and Expectations into Key Process Requirements: The key process requirements needed to meet our customer's needs, and expectations are increased accountability and efficiency in the Education Department.

- Explore Technology Opportunities: The technology opportunities are the ITSM software that will be implemented into the department.

- Develop Outcome Statement: The administrative staff of the Education Department will adapt and accept the new ITSM solution into their daily operations through the support of leadership. The ITSM solution will help establish metrics to improve accountability and processes to increase efficiency.

<u>Analyze</u>

This step looks at identifying the problem and looking at solution alternatives (Alamos Colleges District, 2018).

- The efficiency and accountability problems within the Education Department have led to the need to implement an ITSM solution.

<u>Implement</u>

In this step, the implementation plan and barriers to implementation are developed (Alamos Colleges District, 2018).

- Implementation plan: The implementation begins with configuring and customizing the ITSM solution to meet the needs of the Education Department. After it has been configured, it is implemented into the daily operations of the Education Department and tested out to see where improvements can be made.

- Barriers to implementation: The barriers include resistance from the administrative staff and lack of support from leadership. If the staff members do not actively use the software, then it cannot help with the issues it is intended to solve. Also, if the Department Chair does not support or encourage the use of the ITSM solution, then the staff will not be motivated to use the system. Effort from leadership and staff needs to come together to ensure the successful implementation of the solution.

Measure

This step includes analyzing the data to understand the performance, reach conclusions, and verify the effectiveness of the solution (Alamos Colleges District, 2018).

- After the metrics have been established in the ITSM solution, the Department Chair and the administrative staff can understand and reach conclusions about performance within the department. The effectiveness of the solution will be demonstrated over time and with active and continuous use of the ITSM solution.

Standardize

This step involves assigning ownership to the new approach as well as using documentation and education to standardize the solution (Alamos Colleges District, 2018).

- The Chair of the Department and the three staff members are responsible for the overall success of the solution. If leadership creates a culture that promotes and encourages the use of the ITSM solution, then the staff are more inclined to accept the software. After continuous use of the solution, a knowledge base of the new processes and procedures is created.

<u>Develop Future Plans</u>

In this final step, improvement opportunities are identified as well as areas for replication. Improvements to the solution are evaluated as well as the effectiveness of the process (Alamos Colleges District, 2018).

- Improvement opportunities are identified after the ITSM solution has been tested and used by the Education Department. If the implementation has been successful, then it could be implemented into other departments in the college to create an enterprise service management solution.

- As the solution continues to be used, areas for improvement are determined as well as the overall effectiveness of the solution.

The Process Design Model by the Alamos Colleges District provides an excellent guide to the implementation of the ITSM solution into the Education Department. By following the guide, the Education Department is better equipped to successfully implement the solution. The selection of the ITSM solution is determined in the following chapters based on the needs of the Education Department.

Service Management

The Education Department offers a service to the Students, Faculty, and external customers of the public University. Evert Gummesson (1993) presents the bureaucratic-legal paradigm of service management offered in public institutions. "The rate of change is low and historical phenomena, inadequate

laws, obsolete regulations and practices as well as dysfunctional organizational structures may control activities. The computer is extensively used for mass data processing. Services are treated as administrative routines. Power is formally exercised by representative democracy through politicians, civil servants and experts" (ibid., p. 78). In an attempt to move the Education Department from a bureaucratic-legal paradigm, the project intends to adjust and adapt the current service management to increase efficiency, communication, effectiveness, and accountability. Service management is intended to "understand how the organisation (personnel, technology and physical resources, systems and customers) will be able to produce and deliver this utility or quality" (Grönroos, 1990, p. 7). Focusing on a service management that provides quality service is an important step for improving the overall efficiency of the Education Department.

<u>IT Service Management</u>

Improving customer service, managing service requests, removing information silos, and establishing metrics for accountability are the reasons why this project looked at an ITSM solution. "Customer orientation is one of the most important strategic orientations in the context of strategic IT management in today's enterprises" (Braun & Winter, 2007, p. 1215). ITSM follows the framework laid out by the IT infrastructure Library (ITIL) which is "the de-facto-standard for IT service provider and it is probably the most extensive concept for IT Service Management (ITSM)" (Braun & Winter, 2007, p. 1216). ITIL helps

guide the integration of ITSM with an organization's overall business strategy. "IT service management is about how you manage the services you deliver to your customers and end users. Whereas, ITIL guides you towards the best possible ways to achieving the same" (Freshservice.com/ITIL). Implementing an ITSM solutions into a non-IT department can help bring in the benefits of ITSM practices. It would greatly benefit the Education Department by creating metrics to track accountability of the three administrative staff members. The ITSM software that is chosen will provide a dashboard which displays service requests submitted to the office, it will allow everyone to add notes, discuss any issues, updated outdated processes, and complete the service request in an efficient and timely manner.

<p align="center">IT Service Management Solutions</p>

There are several ITSM solutions available for trial and use. Although most of them are geared toward IT departments, many of them can be customized to fit the needs of the Education Department. The ITSM software solutions that were reviewed for this project are Spiceworks, Cherwell, CityWorks, and Freshservice.

<u>Spiceworks</u>

Spiceworks is a free online ITSM software. The software can be downloaded and used for free with ads. It could also be hosted on the department's network. Spiceworks offers IT professionals with free online tools to manage IT service requests (Spiceworks.com).

Advantages:

- Software and customer support are offered for Free

- Can choose from Online vs. Self-Hosted

- Easy to setup and manage

- Customizable for IT services

- Mobile application available

Disadvantages:

- Aimed directly for IT Help Desk

- May not be easily adapted to a non-IT department

- Displays Ad's in the software

Spiceworks offers resources and tools that are specifically aimed towards IT help desk. It would help log and monitor work requests as well as create metrics to track accountability. However, it may not be easily customizable to a non-IT area such as the Education Department. The next section gives a brief overview of Cherwell.

Cherwell

Cherwell offers several service management solutions including ITSM, IT Asset Management, and Enterprise Service Management. The Cherwell ITSM uses the ITIL as the IT service framework (Cherwell.com).

Advantages:

- High-end features and capabilities

- Mobile application available

- Can be configured and modified

- User friendly interface

- Can run on the cloud, on-premises or through a Managed
  Service Provider (MSP)

Disadvantages:

- Difficult to implement and customize

- Can be costly to implement

Cherwell is a higher-end product with advanced technological features that would be suitable for a larger enterprise with a dedicated administrator. The next section gives a brief overview of CityWorks.

<u>CityWorks</u>

CityWorks is a work order management system that is targeted towards local governments and utility companies. It utilizes Esri's ArcGIS software on their platform to track assets and work order requests (Cityworks.com).

Advantages:

- Friendly user interface

- Mobile application available

- Easy to track work orders

Disadvantages:

- Targeted towards utility companies

- Tools may not be useful for the Education Department

The Cityworks system is an innovative approach to tracking facilities work orders. The work ordering system may be useful for the Education Department. However, it may include other features that the Education Department does not need. The next section includes a brief overview of Freshservice.

Freshservice

Freshservice is a cloud based ITSM solution that provides service desk solutions to different industries. Freshservice also uses the ITIL framework and it provides a way for organizations to manage service level agreements, or SLA's. (Feshservice.com/Features).

Advantages:

- Easy to implement and integrate

- Adaptable to non-IT departments

- Cost-effective pricing model

- Provides several features to track service requests, increase communication, and accountability

- Mobile application available

Disadvantages:

- Some features may not be needed by the Education Department

Freshservice provides several features that can be used by non-IT departments. The features are easy to use, and they also provide extensive support for the software.

<u>ITSM Decision</u>

The ITSM solutions that were reviewed in the project all have features that could be beneficial to the Education Department. After careful consideration, the ITSM solution that will be used for this project is the Freshservice ITSM solution. Freshservice provides several features that can help the Education department meet the project's goals. It will help increase communication, monitor and track service requests, create a knowledge base, and create accountability metrics.

CHAPTER THREE

IMPLEMENTATION

Chapter Overview

This chapter covers the implementation of Freshservice for the Education Department. For the purpose of this project, the trial period was used. Configurations were made to meet the needs of the education department. The following sections describe the installation, configuration, and customization of the Freshservice's features. The configuration decisions that were made helped the Education Department get started with the features in Freshservice. It allowed them to use the ITSM solution easily and quickly.

Installation

Freshservice is a cloud based ITSM solution therefore, after creating an account you can begin by creating your helpdesk URL and setting up your support email. The support email for the Education Department is https://educationdepartment1.freshservice.com. Figure 3.1 shows the initial "Getting Started" page after an account is created in Freshservice. The getting started page also allows you to invite team members as well as guides to show you how to use the available features. The initial getting started page does not require an extensive amount of time and it is very simple to set up. The next section demonstrates the configuration and customizations that were made to fit the needs of the Education Department.
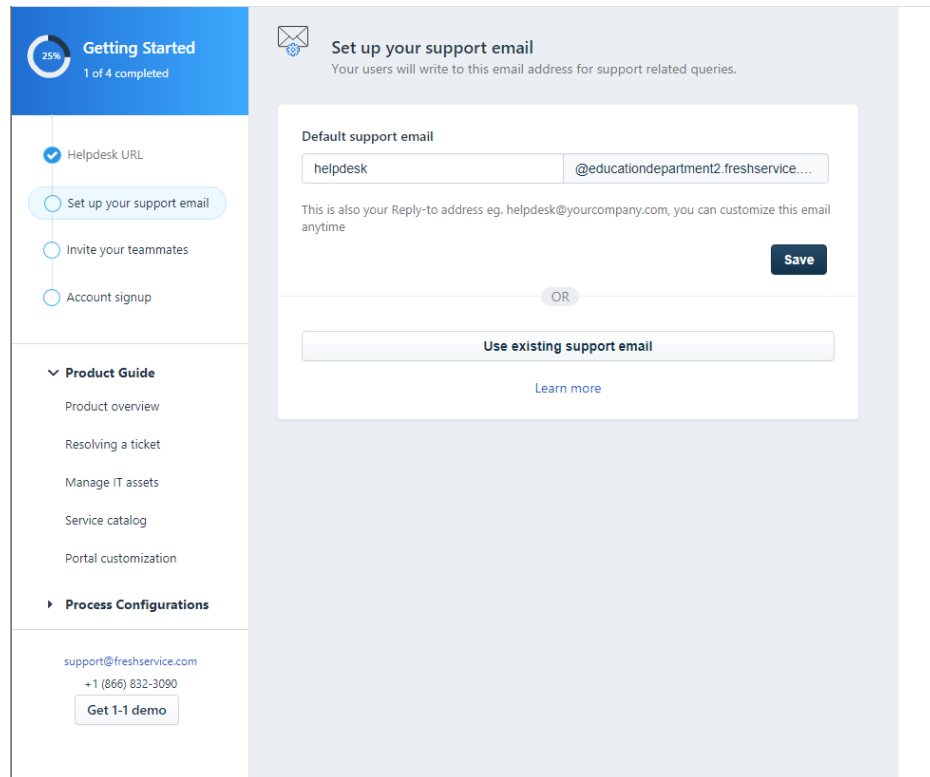
Figure 3.1 Freshservice Getting Started Page.

Configuration and Customization

Freshservice provides several opportunities to customize the features to meet the needs of the Education Department. The configuration and customization decisions that were made helped guide the Education Department in the initial stages of the implementation.

Email Forwarding Configuration

The ITSM solution allows emails from the Education Department to be forwarded to Freshservice so that they can automatically be created into tickets. Email forwarding is done by following the steps below. Freshservice

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documentation was referenced during this email configuration

(Support.freshservice.com, 2019).

1. After logging into Freshservice, navigate to the Admin (gear symbol).

2. Then under General Settings, click on Support Channels.
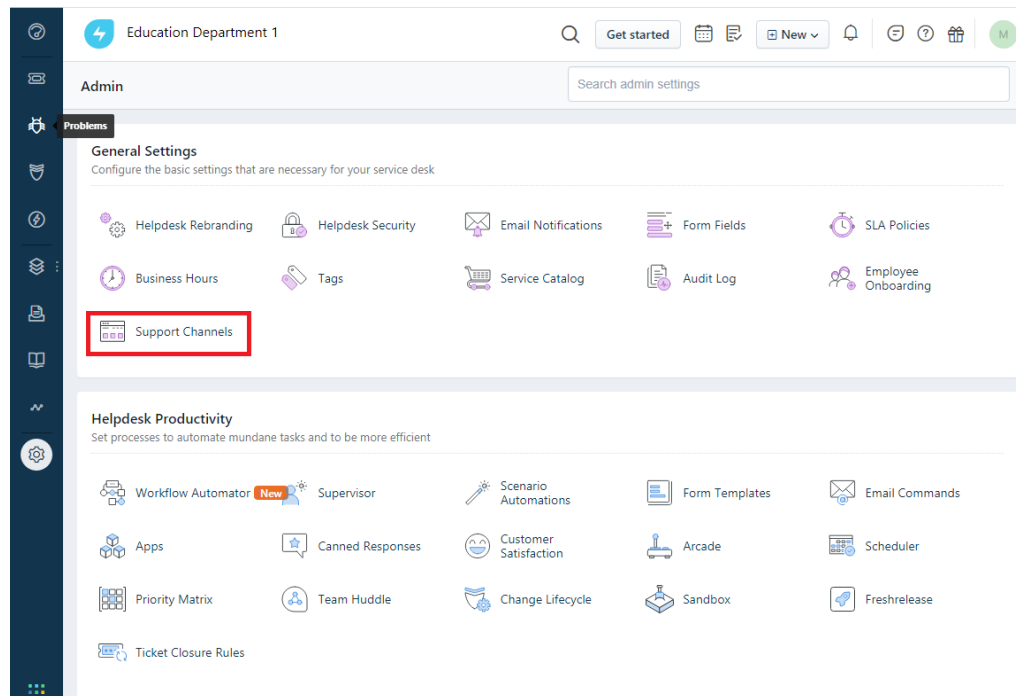
Figure 3.2 Freshservice Admin Page.

3. Select the email link.
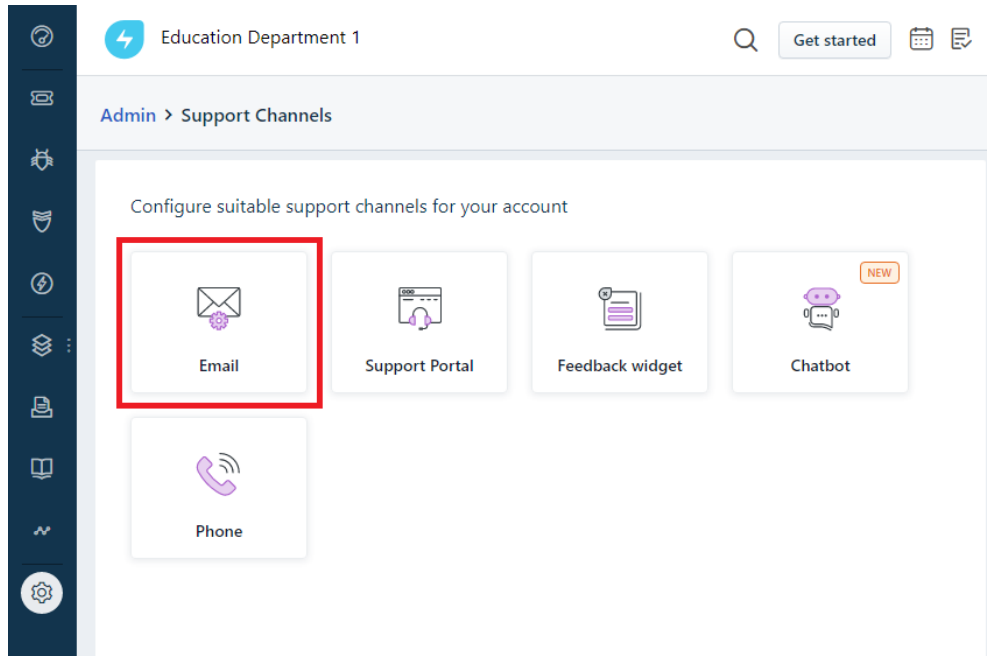
Figure 3.3 Email Link.

4. Under Global Support Emails, click Edit.
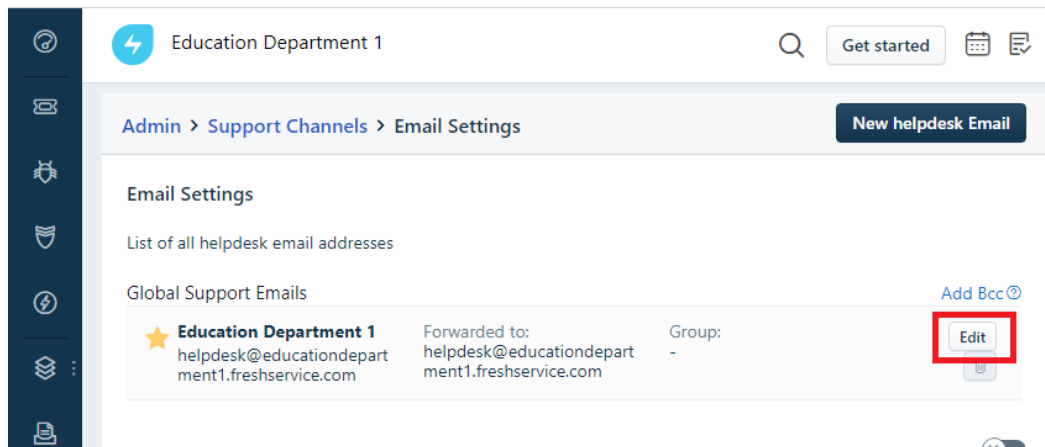
Figure 3.4 Email Setting Edit Link Location.

5. On the Email setting page, under Forward your emails to, copy the email address to your clipboard.
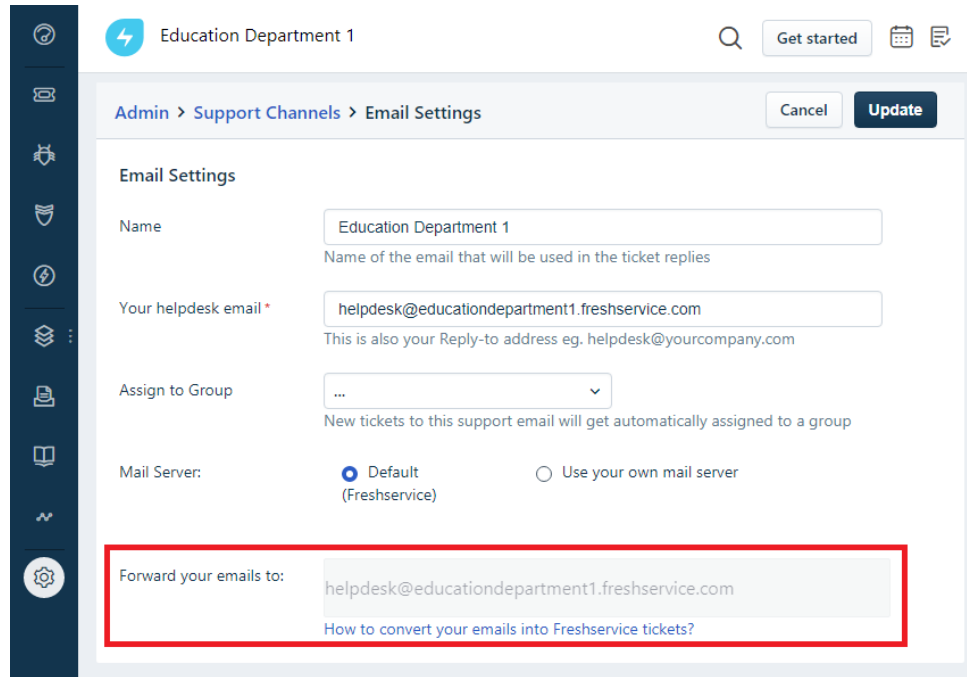
Figure 3.5 Email Forwarding Address Location.

6. In your email setting, in this case Gmail settings, select Forwarding and POP/IMAP.
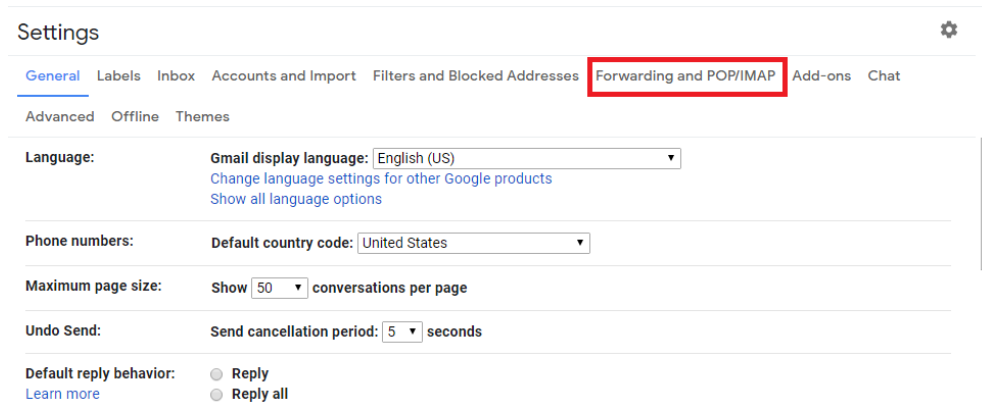
Figure 3.6 Location of Forwarding and POP/IMAP Link in Gmail.

7. Add the forwarding address that was copied from the Freshservice Email

   Setting page and click Next.
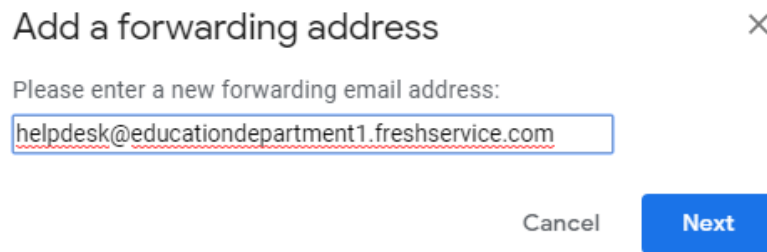
Figure 3.7 Add a Forwarding Address Box.

8. An email is sent to Freshservice and it is created into a ticket. In the

   Ticket, click on the link to confirm the request.
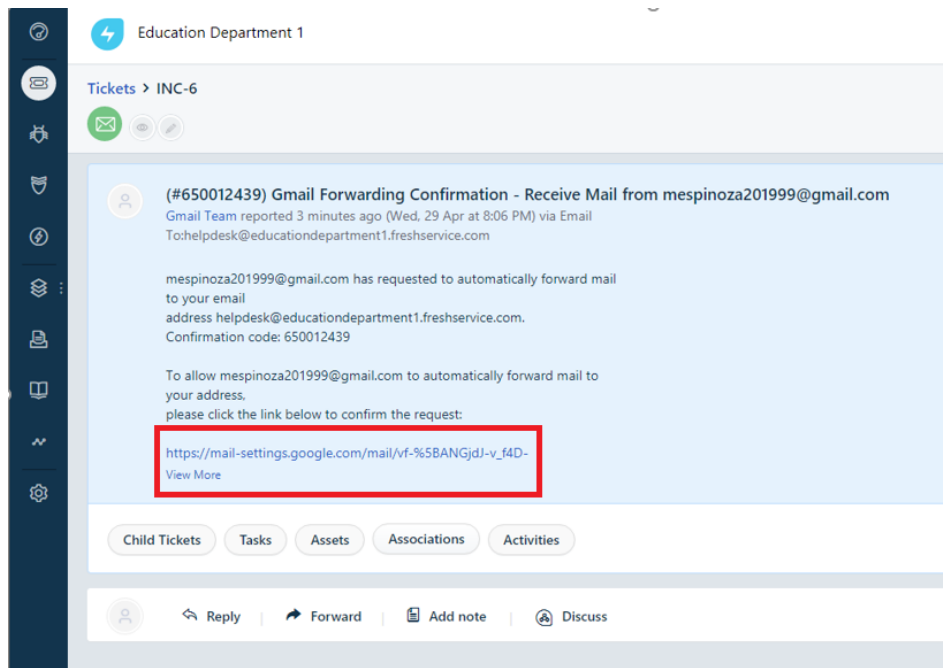
Figure 3.8 Gmail Forwarding Confirmation Email.

9. Click on confirm in.
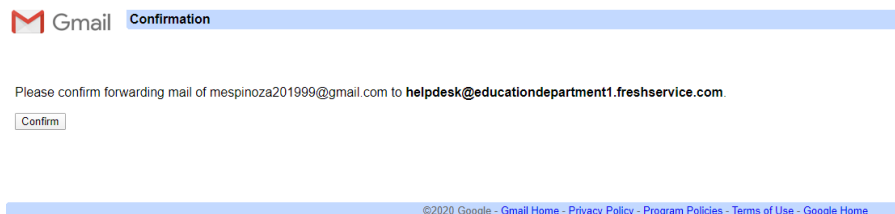
Figure 3.9 Confirmation Page.

10. To confirm that emails sent to your work email are now forwarded to Freshservice, a test email was sent from a Yahoo email address.
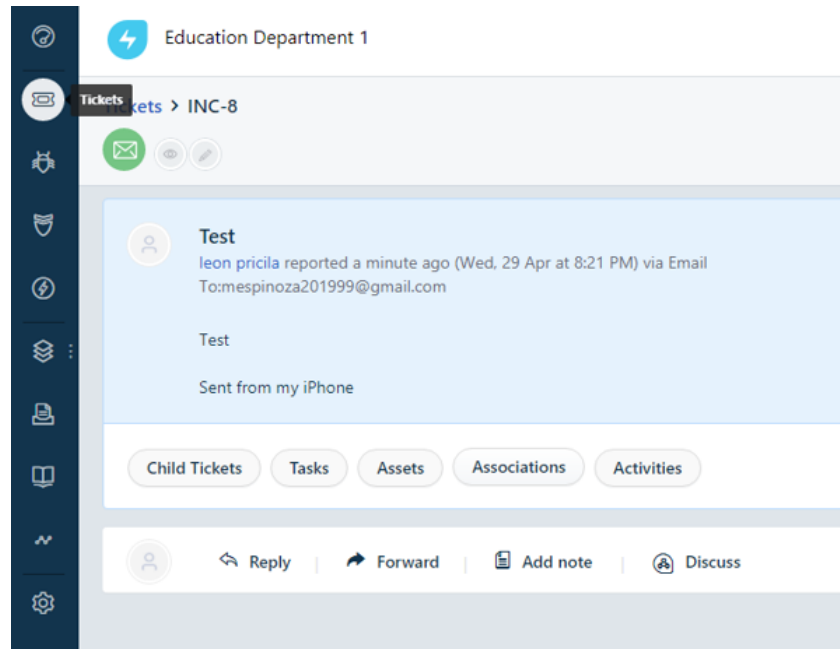
Figure 3.10 Test Email.

Now that the email forwarding has been configured, any emails that are sent to the department email address are created into tickets in Freshservice. This allows all the staff members to see the service requests that are submitted to the department as well as the status of the request. Figure 3.11 shows the tickets that have been created from the forwarded emails, under the tickets tab in Freshworks.
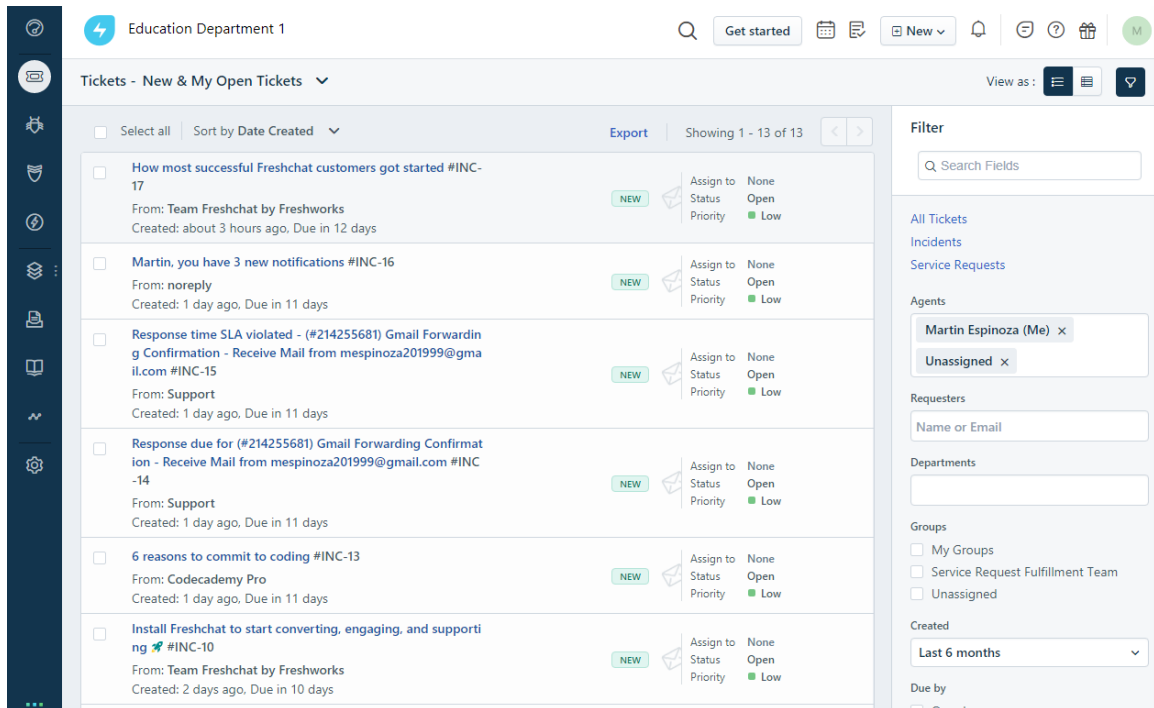
Figure 3.11 Freshservice Tickets Tab.

Creating Agents

       In Freshservice, agents are the three administrative staff that respond to the service requests submitted by faculty, staff, and external customers. Agents can be added by following the steps below.

1. In Freshservice, navigate to the Admin tab.

2. Under User Management, select the Agents link.
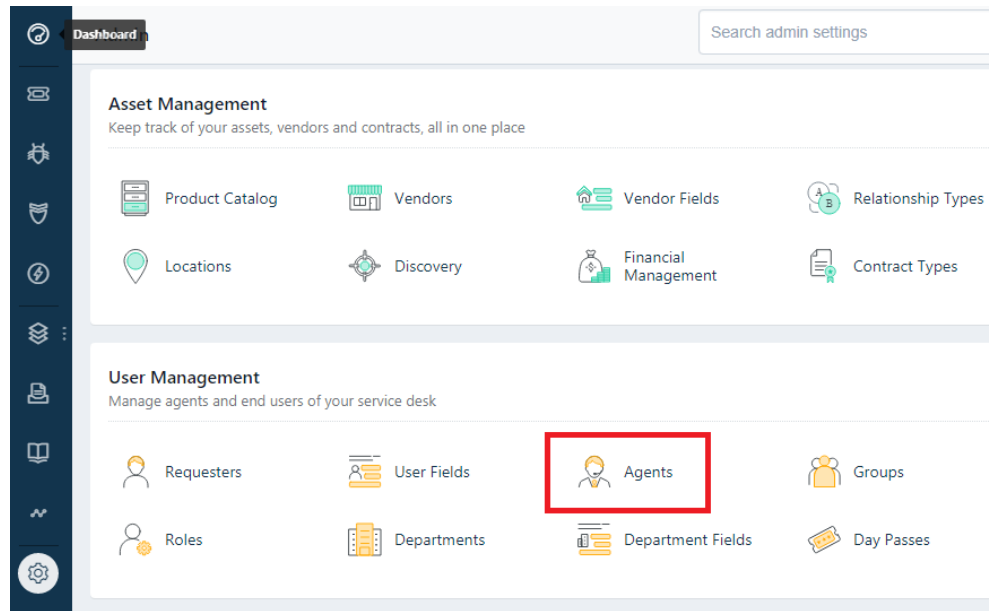
Figure 3.12 Agents Link.

3. Navigate to the New Agent link and enter the staff members information in
the form, then click Save.

Figure 3.13 New Agent Form.

4. The steps above were completed for all three staff members. After that is completed, the three employees are displayed as agents.

After the agents are created, the employees can respond, update, forward, and close out tickets in Freshservice. Figure 3.14 displays the Education Departments, three administrative staff.
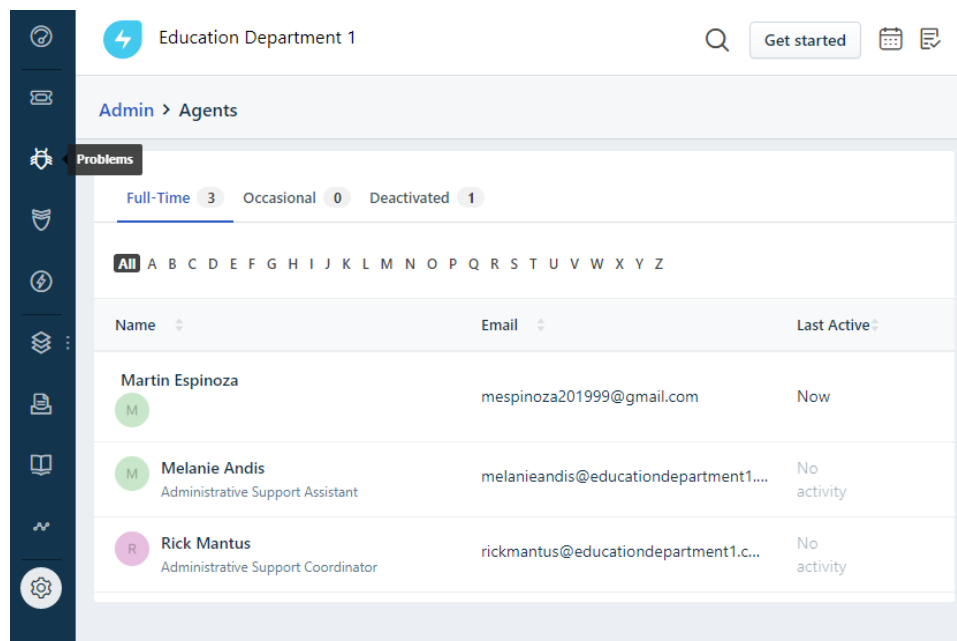
Figure 3.14 Newly Created Agents.

Configuring Service Categories

Freshservice has a Support Portal where faculty, students and external customers can submit requests to the administrative staff. The services were configured to meet the needs of the Education Department. Adding the Key Request service for the department is explained below.

1. In Freshservice, navigate to the Admin tab.

2. Under General Settings, click Service Catalog.
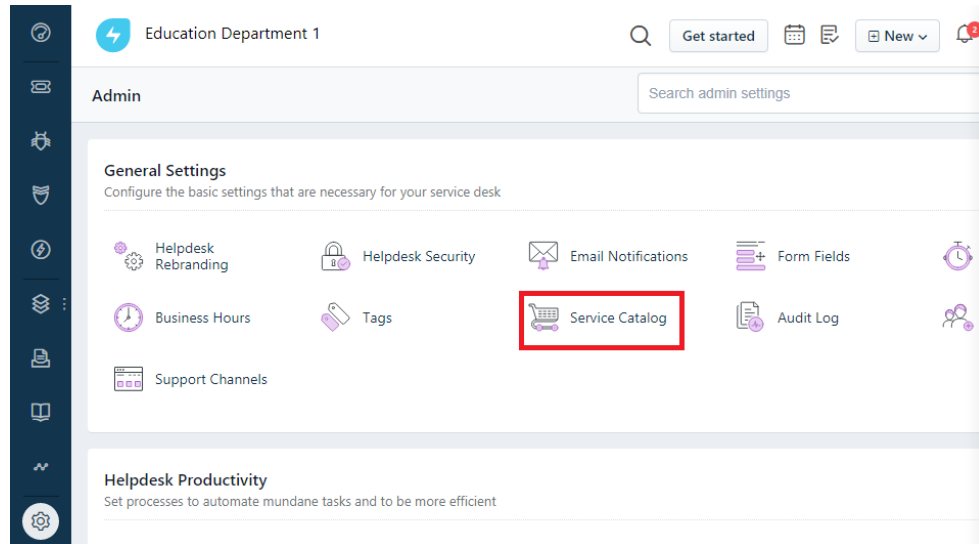
Figure 3.15 Service Catalog Link.

3. On the Service Catalog page, click New then Service Category.
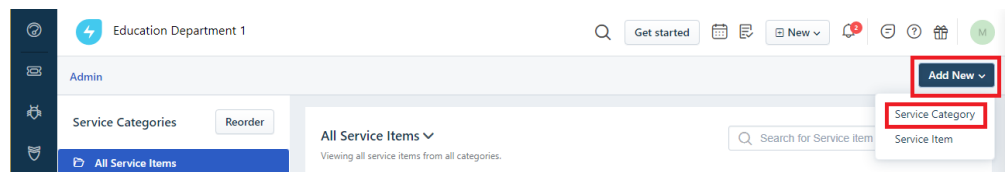
Figure 3.16 Creating a New Service Category.

4. It prompts a New Service Category name and description. Once those sections are filled in, click Create.

Figure 3.17 New Service Category Description.

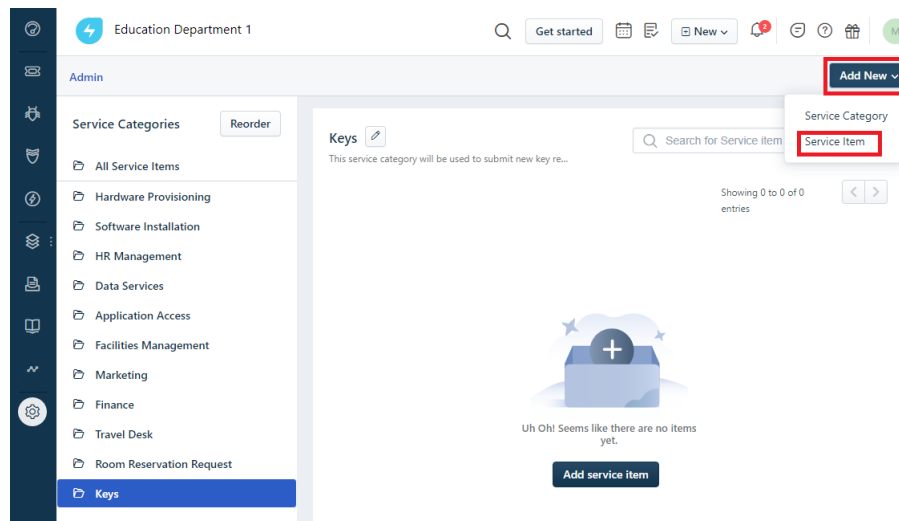5. Under the new Keys service category, click Add New and select Service Item.

Figure 3.18 Link to Create a New Service Item.

6. You will be prompted to customize the fields for the service item. Once you are done, click Save and select Save & Publish.
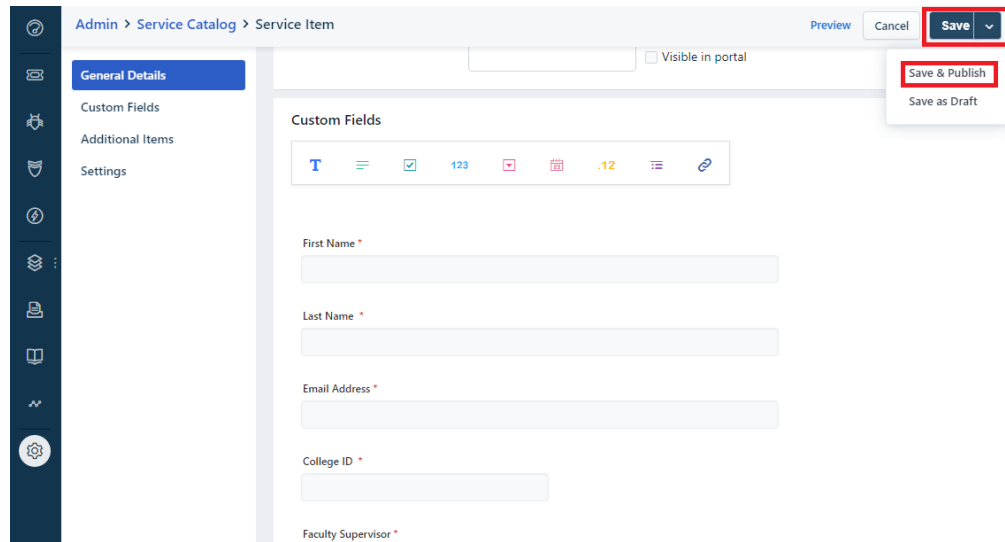
Figure 3.19 Customizing the New Service Item.

7. After the service item has been created you can access the service request in the Support Portal by clicking on your account on the top right corner and selecting View Support Portal.
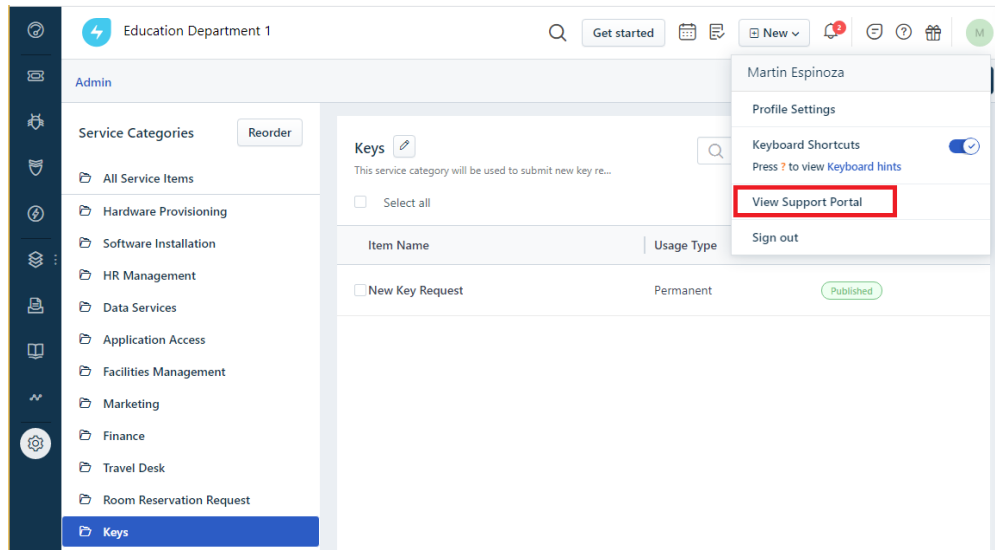
Figure 3.20 Link to Access Support Portal.

8. Once in the Support Portal, select on the Request New Service link.
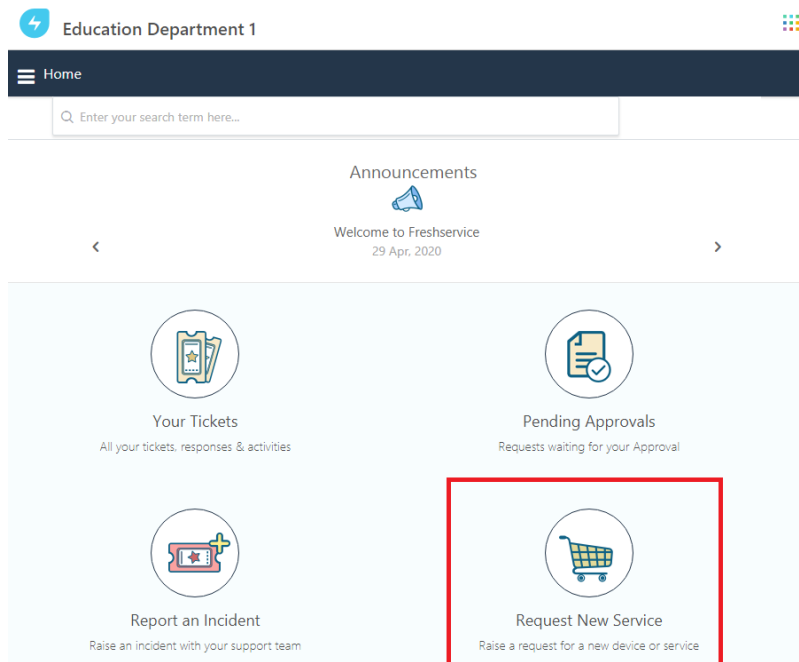
Figure 3.21 Support Portal.

9. From there, navigate to the New Key Request service item.

Figure 3.22 New Key Request Service Item.

The Education Department can add and customize new services and items in Freshservice. Once the items are created, it allows students, faculty and external customers to submit requests directly from the support portal. These requests are turned into tickets that the administrative staff can view and respond to.

Features to Improve Accountability and Efficiency

The overall goal of using the Freshservice ITSM solution is to increase accountability and improve efficiency. Freshservice provides several methods to assist in meeting those goals. The analytics reports, the ticketing system, and the ability to create a knowledge base are extremely beneficial in improving

accountability and efficiency. The following sections describe how to access and configure those features in Freshservice.

<u>Analytics</u>

Freshservice provides curated analytics reports to evaluate the performance of the Education Department. The curated analytics reports can be accessed by following the steps below.
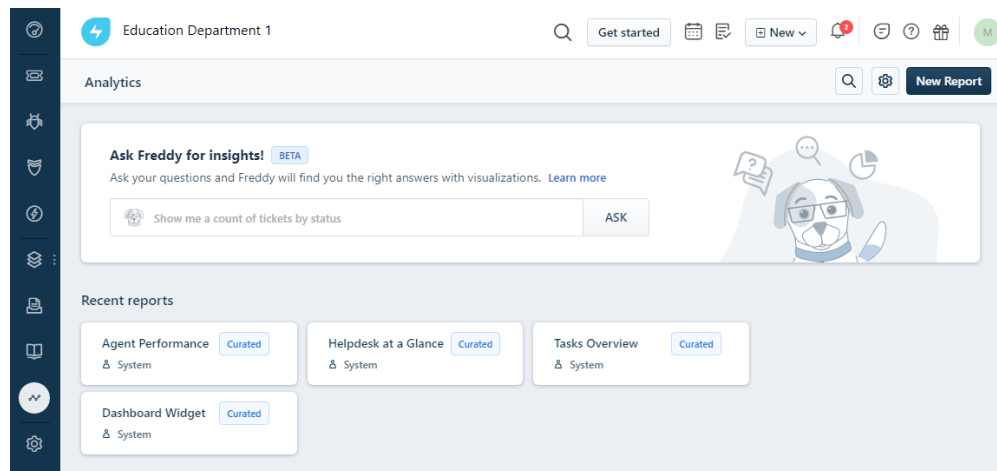
1. In Freshservice, navigate to the Analytics tab.

Figure 3.23 Analytics Tab.

    a. The curated reports are listed under the Analytics tab.

Figure 3.24 List of Curated Reports.

b. The Helpdesk at a Glance curated report displays valuable information about the tickets that have been submitted.
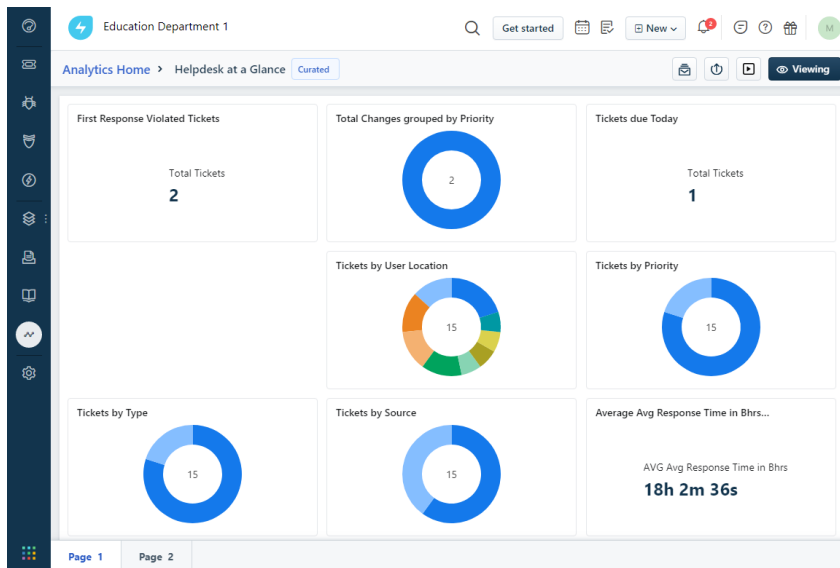

Figure 3.25 Helpdesk at a Glance Curated Report.

c. The Agent Performance curated report displays the number of requests that have been closed out by the administrative staff of the Education Department.
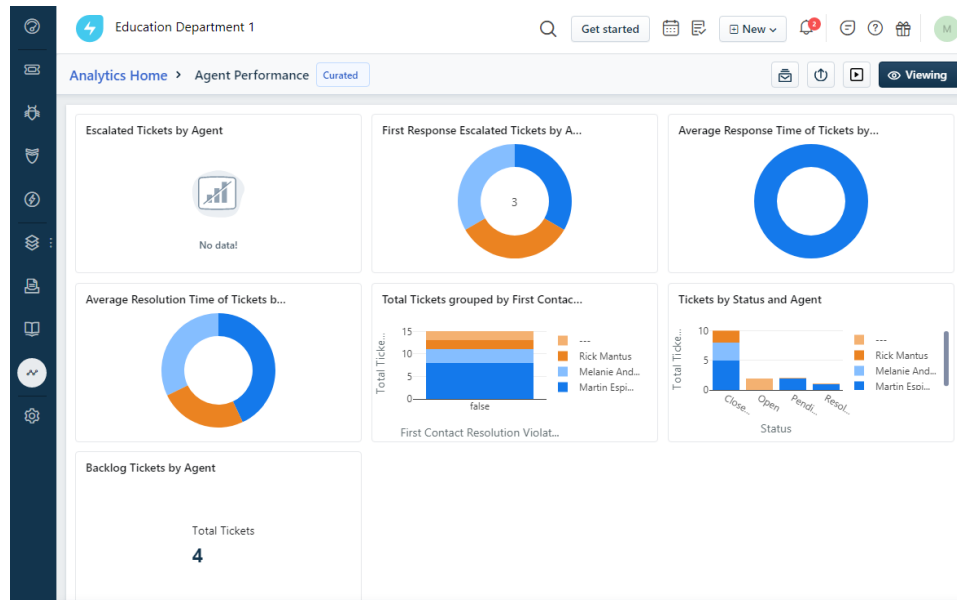

Figure 3.26 Agent Performance.

Freshservice also offers several curated reports that benefit the Education Department immensely. The reports allow leadership and the staff to determine where improvements need to be made and where they are doing well. The Helpdesk at a Glance report and the Agent Performance report helped establish accountability metrics and determine any workload imbalances. New reports can also be created in Freshservice. After more requests have been submitted, reports can be configured and customized according to the needs of the Education Department.

Tickets

The ticket solution in Freshservice allows the administrative staff to track

and respond to service requests that are submitted to the team. Tickets are

created from the forwarded emails that are sent to the department, from the

support portal, and they can also be created by the staff when they receive an

informal request. The following section goes over how to respond to a ticket in

Freshservice.

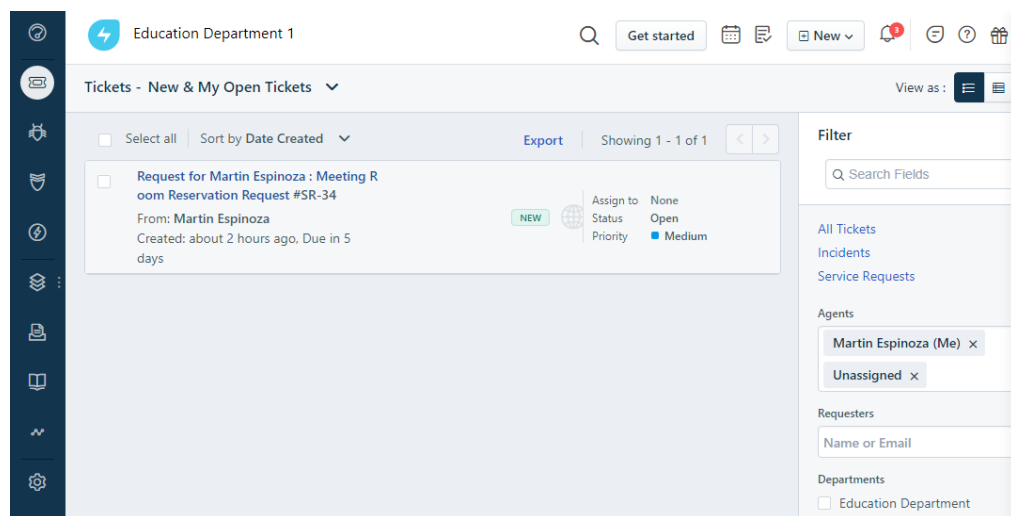1. In Freshservice, navigate to the Tickets tab.

Figure 3.27 Ticket Tab in Freshservice.

2. Once in the ticket, it shows you more information about the service and
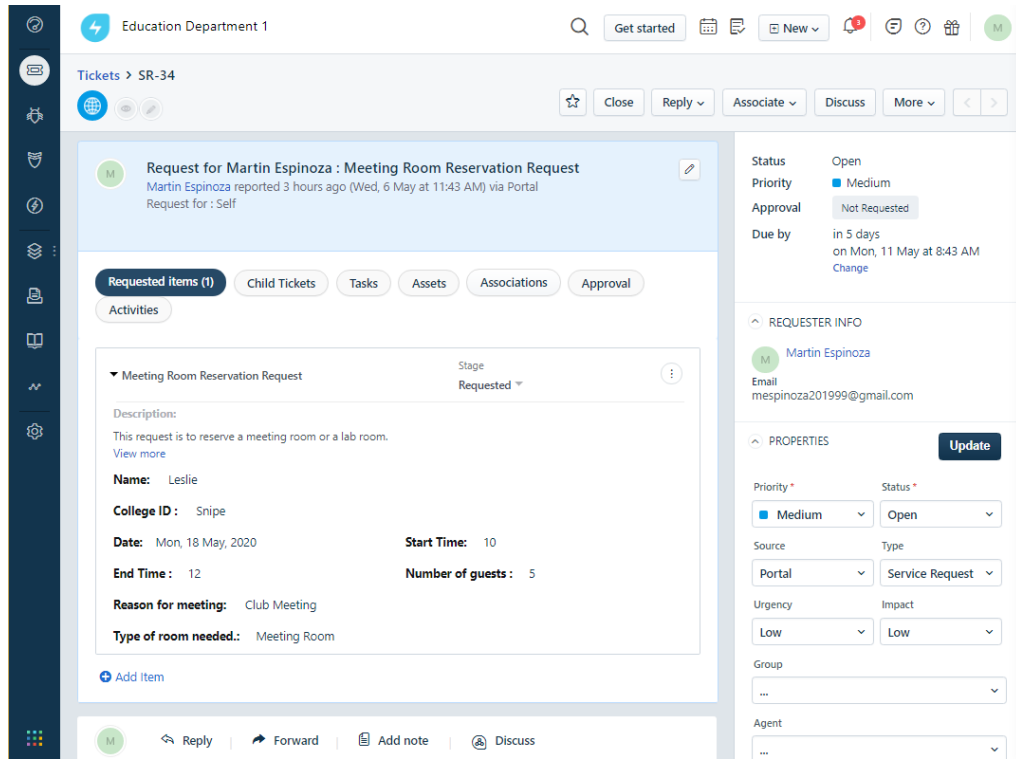
who is requesting it.

Figure 3.28 Service Request Ticket.

3. After the request has been resolved, an email can be sent to the requester.
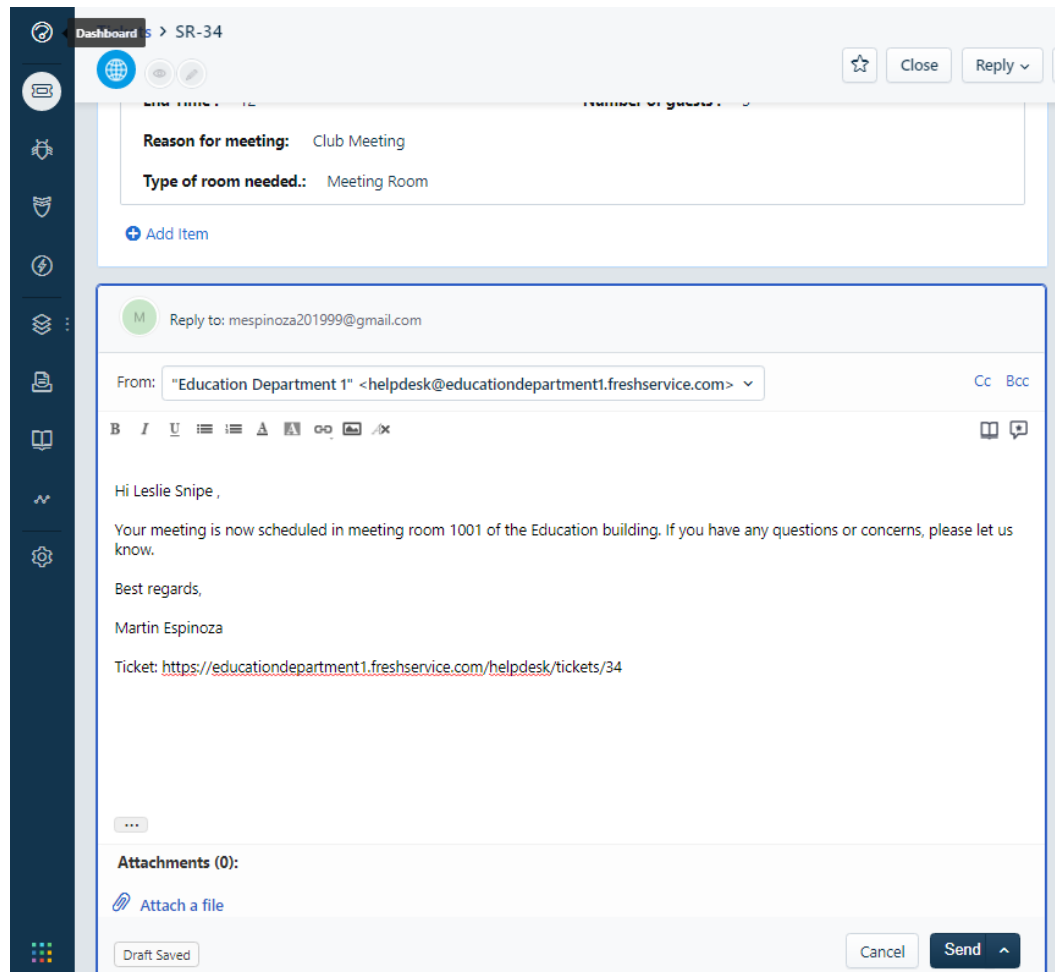
Figure 3.29 Email Reply to the Ticket.

4. The ticket status can now be changed to closed.

Figure 3.30 Updating the Status of a Ticket.

a. Freshservice has a Discuss feature that allows team members to chat any issues or questions about the tickets.
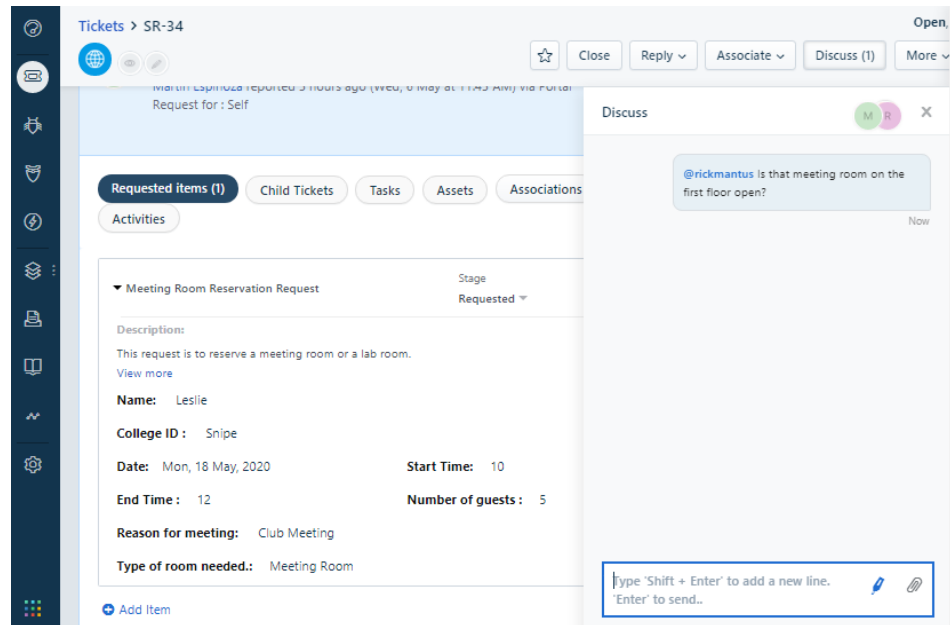
Figure 3.31 Discuss Feature in Freshservice.

b. Freshservice also displays the activities associated with the ticket. It displays all the actions that have been taken in regard to the ticket along with time and date stamps.
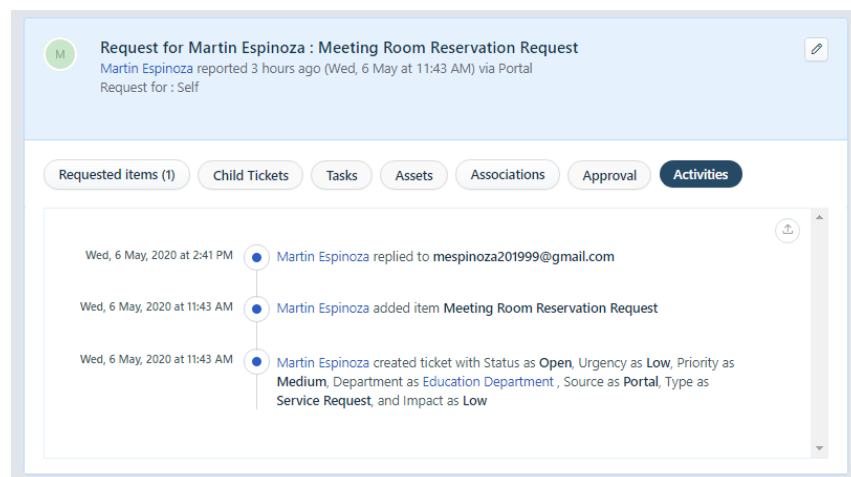

Figure 3.32 Ticket Activities.

5. After the ticket has been closed, it is removed from the list of New & My Open Tickets.
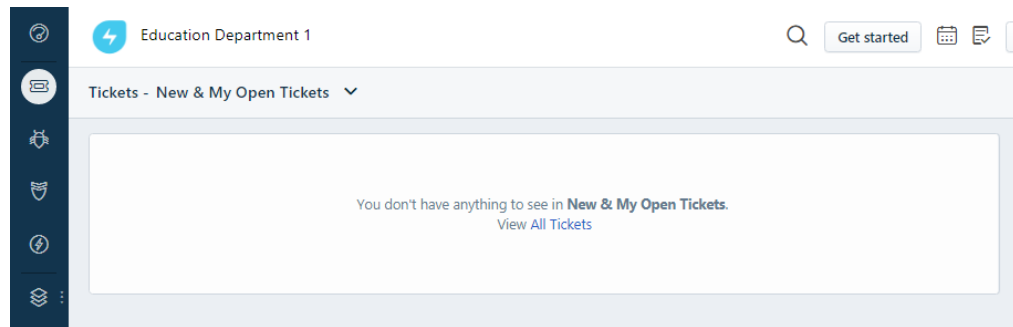
Figure 3.33 Closed Ticket Removed from New and My Open Tickets List.

The tickets feature in Freshworks allowed the Education Department to have an accurate log of the service requests that are received. This feature has helped increase accountability. The administrative staff are able to determine who is working on a specific ticket, view the status of the ticket, and metrics are created to determine the workload balance within the department. It also increased the communication between the team. The administrative staff can discuss any issues about the ticket and look at the activities that have occurred.

Knowledge Base

A knowledge base can be created in Freshservice. The following steps describe adding information to the knowledge base.

1. In Freshservice, navigate to the Solutions tab.

2. A new category needs to be created. In the Solutions tab, select Add New

    and then Category.
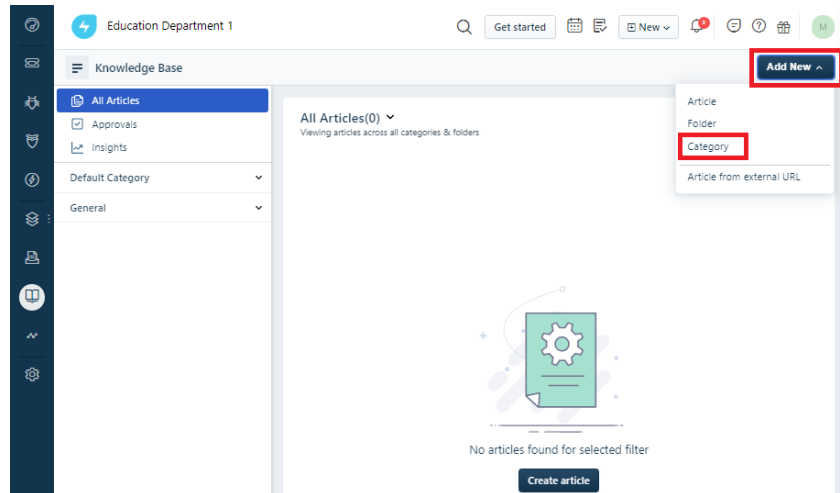
Figure 3.34 Creating a New Category.

3. A box to enter a name and description for the new category is displayed.

    When that is completed, click Save.

Figure 3.35 New Category Name and Description.

4. A new folder needs to be created within the Education Department Knowledge Base category. Select Add New, then Folder.
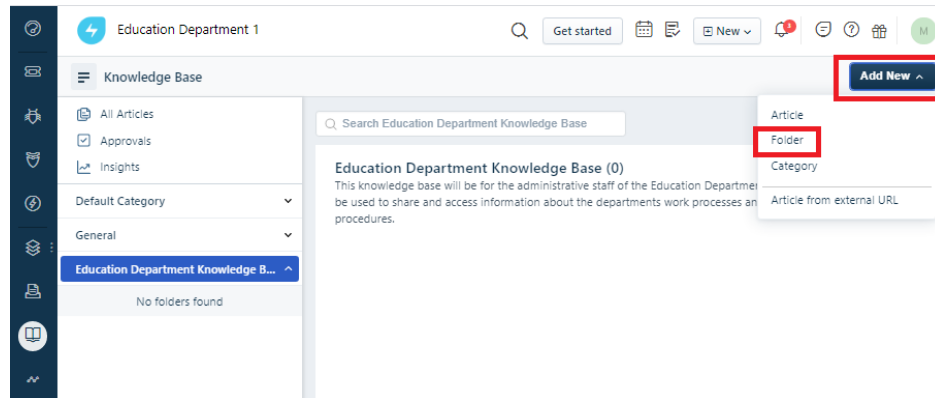
Figure 3.36 Creating a New Folder.

5. The New Folder is only for the administrative staff of the department. The name, description, and visibility settings are adjusted in the New Folder box.

Figure 3.37 New Folder Box.

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6. After the new folder has been created, a new article needs to be created.

   In the Shared Duties folder, click Create Article.
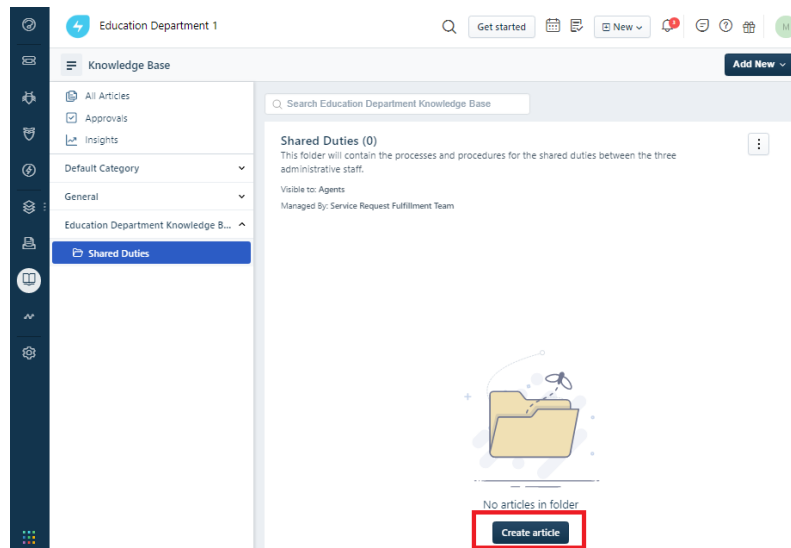
Figure 3.38 Creating a New Article.

7. Enter the information for the procedure that will be added to the Education

   Department's knowledge base, then click Save.
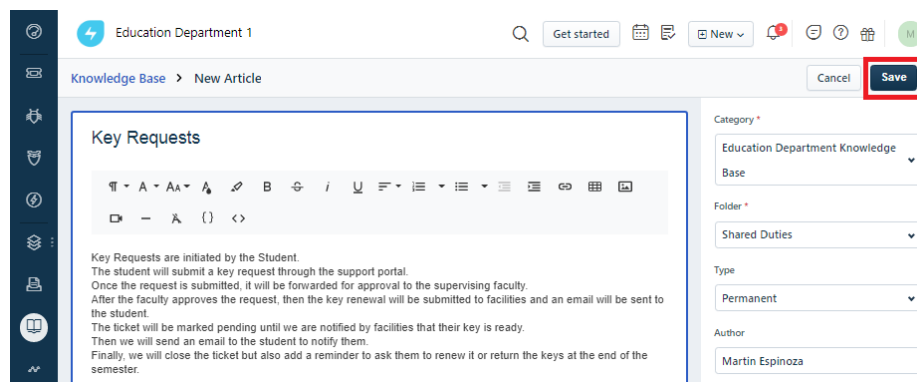
Figure 3.39 New Key Requests Article.

8. After the new article is saved, it needs to be published to the support portal by clicking Publish.
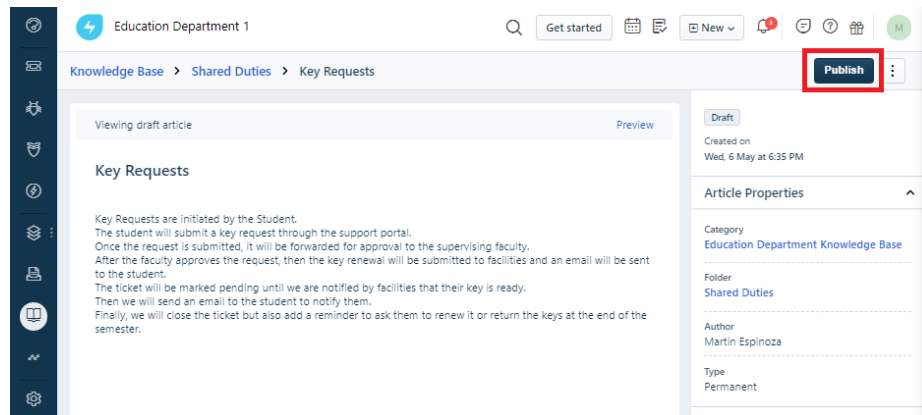
Figure 3.40 Publishing the New Article.

9. The newly created article can now be accessed by the administrative staff in the Support Portal under Solutions.
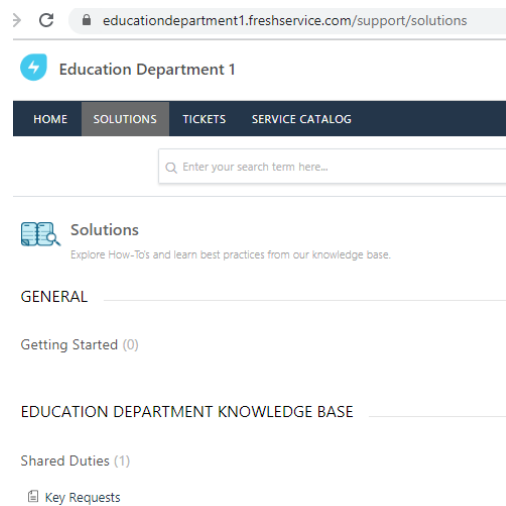
Figure 3.41 Solutions Page in the Support Portal.

The Education Department's Knowledge Base provides the current and future members of the administrative staff with a direct source for information about the department's processes and procedures. It allows the department to capture the staff's tacit knowledge. Documentation for best practices within the department are created and easily accessible to everyone in the office. Having a central location for the department's knowledge base is extremely beneficial in improving efficiency.

CHAPTER FOUR

CONCLUSION

Chapter Overview

This chapter concludes by discussing the challenges that were expected during and after the implementation of the ITSM solution. It also offers some solutions that helped overcome those challenges. Finally, it concludes by summarizing the overall project and future goals.

Challenges to Overcome

The Freshservice ITSM software is an excellent tool to help with the accountability and efficiency issues within the Education Department. The features and services that are offered by the software provide extensive opportunities to improve on the weak areas of the department as well as highlight the strengths within the team. However, the tool cannot provide the intended benefits without the encouragement from leadership and participation from the administrative staff. The challenges of successfully implementing the ITSM solution is reliant on the continued efforts of leadership and staff.

Resistance

Resistance to change and lack of motivation to use the new ITSM solution are challenges that could potentially derail the overall success of the implementation. "A cognitive and behavioural reason is lack of know-how. A lack of conviction that change is needed — questioning the meaning and value of the

change for individuals — inevitably leads to a lack of motivation to change" (Gill, 2003, p. 308). If the administrative staff are not motivated to use the ITSM solution, then it will not continue to meet the goals of the overall project. Accountability cannot be established because the data generated from Freshservice will not be accurate. The staff may also feel that the new ITSM solution is interfering with their current method of operations, "disturbed practices, habits and relationships: 'We've always done it this way'. Moving people from their 'comfortzone' means moving from the familiar, secure and controllable to the unfamiliar, insecure and uncertainly controllable" (Gill, 2003, p. 309). If the administrative staff believe that they have to make significant changes to their daily workflow, it can affect their desire to continue using the system.

There are a few solutions that can help motivate the administrative staff to accept and use the new ITSM solution. Including the administrative staff into the implementation process helped them become more familiar with the new software. It empowered them and provided them with the opportunity to make customizations that helped with their work processes and procedures. By involving all three administrative staff in the task, it helped strengthen the acceptance of the software. Training from Freshservice will also provide the administrative staff with the information they need to customize the software to meet their needs.

Leadership

The role of leadership is crucial in the success in meeting the goals of this project. "While change must be well managed — it must be planned, organised, directed and controlled — it also requires effective leadership to introduce change successfully: it is leadership that makes the difference" (Gill, 2003, p. 307). Without the support of the Dean and the Department chair, the administrative staff will not be incentivized to continue using the ITSM solution. If leadership does not show interest or commitment to making the change, then the staff will follow that example. "A lack of commitment to change may be due to a lack of compelling evidence for the benefits of change. It shows itself in objections, unwillingness to consider options or look at process issues, and the use of 'hidden agendas' or delaying tactics" (Gill, 2003, p. 308). Finally, if leadership does not believe in the benefits that the ITSM solution can bring to the Department, then they will not have a reason to push the project forward.

The role that leadership takes in this project can determine whether the administrative staff continue to use the ITSM solution or not. First, the leaders of the Education Department must be committed and invested in the project. Aligning the reasons for implementing the ITSM solution with the vision and values of the department, strengthens their interest in moving it forward. "Without a shared vision, there is no alignment" (Gill, 2003, p. 313). The vision for this project is to have a system in place that increases the accountability and efficiency in the Education Department. Thereby, also increasing the

communication and benefiting the overall delivery of service to our faculty, students, and community. Leadership also needs to encourage a shared vision, values, and culture. It allows for everyone to be on the same page and work together to accept the change that is being implemented. If both leadership and staff share the same vision for the organization, they are all motivated and driven to actively incorporate the ITSM solution into the daily workflow. It will not only continue to increase accountability and efficiency, but it also helps the department accomplish their vision and values. Encouragement and commitment from leadership will be the deciding factor in the continued success of the project.

<div align="center">Conclusion</div>

The overall goal of this project is to increase the accountability and efficiency of the Education Department. The current processes and procedures set in place are inefficient and it does not promote a stable work environment. The current pandemic has also highlighted the need for a solution to the efficiency and communication problems within the department. One way to address the workflow problems within the Education Department is through the use of technology. An ITSM solution allows the Education Department to create a method of completing service requests efficiently and effectively. It also create the metrics needed to keep the staff accountable to the customers it serves.

The Freshservice ITSM solution is a highly effective tool that helped meet the goals of this project. Strong encouragement from leadership is needed to

motivate the administrative staff to accept the new solution. The staff's

involvement in the process also helped solidify their understanding of the ITSM

solution. It demonstrated the technical benefits of the software as well as the

overall benefits in meeting the vision and values of the department.

Future goals for the implementation of this project would be to further

customize the software to fit the needs of the department. After it has been fully

customized, then leadership and staff can determine the strengths and

weaknesses of the software. This allows them to determine if it does indeed help

increase accountability and efficiency. If the project goals are met, then the

Freshservice solution should be permanently added to the department.

APPENDIX A

ACRONYMS AND ABBREVIATIONS

ITSM   Information Technology Service Management

ITIL   Information Technology Infrastructure Library

SMS   Service Management Solution

SLA   Service Level Agreement

MSP   Managed Service Provider

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