

Version 3.0

ICT Services The EdITion

April 2024

www.ufs.ac.za/ict

*Inspiring excellence,
transforming lives
through quality,
impact, and care.*

VISION **130**
*Renew and Reimagine
for 2034*

UNIVERSITY OF THE
FREE STATE
UNIVERSITEIT VAN DIE
VRYSTAAT
YUNIVESITHI YA
FREISTATA



UFS
INFORMATION AND
COMMUNICATION
TECHNOLOGY SERVICES
(ICT SERVICES)



The world of digital technologies generates and hosts a language of its own, in addition to spawning processes to align to technology choices made by the institution (in this case, the University of the Free State and its staff members). *The Edition* is an initiative of ICT Services to introduce and explain the world and terminology of IT to enable staff members to effectively engage with ICT Services. This is somewhat of a ‘tall order’, as it requires the reader to actually engage with the topics in the booklet with a view to requesting services from a more informed perspective, but also to aid ICT Services in delivering exactly what is required at that point in time.

The Edition provides a structured perspective on the complex interplay between the internal divisions of ICT Services, each of which provide technical support in a very specific group of technologies and services aligned to its purpose. In this way, ICTS’s internal processes are explained and structured to deliver a specific solution, solve a particular problem, and provide guidance for the optimal utilisation of the technologies at the disposal of UFS staff members.

Enjoy the ride ... we certainly are! ■


Introduction



ICTS's outlook (12 months)

Vision 130 introduced a very well-defined picture of the University over a period of 12 years. The timeframe described in the UFS Strategic Plan includes a significant change in its business model and approach, but also in terms of its preferred culture and academic outcome. All of this has far-reaching implications for ICT Services, as technologies need to align to the desired outcome of the institutional strategy.

Technology lifecycles are much shorter than the duration of Vision 130, and it is expected that several generations of a specific technology type will necessitate frequent upgrades, renewals and replacements while Vision 130 unfolds. This requires an in-time, continuous re-evaluation of current technologies, as well as a continual alignment of emerging technologies en route to the Vision 130 end state.



Based on the foregoing, the 12-month outlook of ICT Services in support of the UFS's current operating models and culture and the impact of changes introduced by Vision 130 on ICT Services pivots off the following five areas of specification:

- Digital Security
- Effective Data Management
- Governance and Control
- Business Enablement
- Operational Integrity

The order in which these fields of expertise are mentioned is also the order in which ICT Services responds to any incoming service/technology request and therefore represents the operational principles of ICT Services.

Each UFS staff member reading this booklet will attach a very specific perspective to these five fields of expertise, either as an operational risk to themselves or a threat to their professional image, or as an operational reality in their professional work procedure. If deemed to be essential for safeguarding their professional role, these five fields of expertise will always be kept in the back of the mind and become the guiding backdrop to being digitally safe. This stance towards these matters, as well as a good understanding thereof, will result in a very effective work procedure, digital safety, and the optimal utilisation of both hardware and software components required for the specific role and function in the operational landscape of the University.

Thank you for reading this booklet, asking questions for clarification, and embedding sound digital practices in your specific role and function at the UFS. ■




ManageEngine:

By Wimpie Botha

How it has **changed the dynamics** of ICTS at the UFS

Information and Communication Technology Services, in any environment, has evolved significantly over the past decades from being a specialised back-office function, rarely ever seen, to a moderately integrated business enabler through to becoming a core business component in recent years. During this technological evolution, the methodologies and technologies required to manage and enhance the services associated with ICT provisioning have also evolved. Throughout this evolutionary period, the only constant has remained a focus on customer satisfaction.



During ICTS's humble beginnings at the UFS, there has only been a very basic technology footprint to maintain. It was during this era that a simple system for managing services on a task-by-task level was required to tend to the needs of the community. During this period the University developed and maintained an in-house solution for managing the day-to-day operations. This solution was used effectively over 10 years and served the needs of all the university's ICT services. Then, the next phase approached...

Subsequent to this, a new dawn was ushered in and ICTS quickly became a higher-level institutional enabler and the managing of day-to-day tasks was no longer sufficient. The UFS required an ICTS division that could manage a much more dynamic environment, with the complexity of ICT Services evolving from a technically-orientated management approach to a multi-faceted service delivery approach. Gone were the days of ICTS being a basic in-house task manager and in came Information Technology Service Management (ITSM).

In 2012, ICTS launched an extensive investigation aimed at finding the right system for managing its services. This process took over four years to complete and ICTS has evolved into a function with multiple

integrated domains. During this time, the system was required to manage the baseline requirements of day-to-day tickets for resource management, including a number of other managed services such as hardware and software asset tracking, the introduction of a services catalogue as well as advanced workflows managing process handovers and handoffs. The ITSM also provided an overview of general customer experience which greatly assisted in continuous improvement, and which in turn initiated the next evolutionary phase.

Once again, an increase in the complexity of ICTS management was seen, exacerbated by the Covid-19 pandemic and personal data protection, which opened up new frontiers for ICTS staff to manage. ICTS became a core component of the institution and gave prominence to the mantra “*You have to measure in order to manage*”. This realisation moved the industry into the data-driven world, where services are managed proactively and data is key. To act on any form of data, ICTS has to ensure that the integrity and quality of data is maintained. Here, multiple systems are relied on to gather data in an isolated approach. This approach deprives the department of maintaining a single version of the truth, so to speak, and at a high cost, as multiple

contracts must be maintained with multiple specialists guarding over each system. The criticality of rationalising and simplifying operations emerged. After much research and investigation into a “one-stop” ITSM solution for the above mentioned challenges, ICTS selected ManageEngine (ME), through a comprehensive selection process.

ManageEngine offered a multitude of different solutions that can be stacked upon each other as a fully integrated, consolidated and supported solution. This allows ICTS to monitor endpoints in terms of resources, vulnerabilities, compliance and uptime as never before. ICTS can effectively manage all services across all ICTS domains from a single point of view.

The following improvements offered by ManageEngine need to be highlighted:

- Improved communication between the user and the supporter through notes and emails relating to requests;
- The user-friendly service catalogue enables ICTS customers to easily create and navigate through the correct request;
- Digitisation of templates;
- Endpoint Central provides easier access to information about devices located across the three campuses;
- ManageEngine’s integrated solution enables ICTS to integrate between different platforms, allowing improved service management by means of process automation. Here, ICTS has implemented process automation as follows:
 - Integration with the institutional Enterprise Resource Planning solution (ERP) to autogenerate purchase orders and associated requests.
 - Endpoint Central to ServiceDesk Plus improves the availability of asset information and pro-active support abilities by monitoring endpoint resources.
 - Enhanced and automated reporting abilities via Analytics Plus.

Conclusion

The key driving factors in ICTS’s decision to implement ManageEngine constitute product functionality, performance and long-term cost of ownership. From a holistic point of view, ManageEngine has improved workflows, business processes and rules, customer satisfaction, compliance and risk management, business process agility and increased productivity, bringing enhanced capability and goal fulfilment. ■

<https://SolveIT.ufs.ac.za>

Access the ICTS knowledge base

A knowledge base is a self-serve online library of information about a product, service, department, or topic.

ICTS Knowledge base

The ICTS knowledge base is a published collection of documentation that includes answers to frequently asked questions, how-to guides, and troubleshooting instructions.

Our knowledge contributors are well versed in the relevant subjects associated with their roles and functions within ICT Services. It is designed to make it easy for the end-user to find solutions to their problems without having to ask for help.

These resources are regularly updated with new and existing solutions that address questions related to technology, connectivity, software, hardware, and other IT related topics.



Why do we need a knowledge base?

In today's connected world, people expect and demand easy access to accurate information. It is increasingly the case that users do not wish to make a phone call to get the right answers, and neither do they wish to send an email or file a service ticket: they want the answer they need immediately.

What are the benefits?

A knowledge base provides instant, on-demand information from a central repository that is easily accessible.

Through our knowledge base we are able to improve self-service, provide greater access to solutions, and offer regular updates.

Using a knowledge base means that all users at the UFS will consult the same information platform when a solution to a problem is sought. The uniformity of this platform will help to reduce confusion because the same information is available to both the service-desk agent as well as the end-user. ■

<https://Solvet.ufs.ac.za>

Why data

Data governance is an essential aspect of modern university management and is critical to the University's digital transformation initiatives. Data governance guarantees that the data is correct, dependable, and compliant with industry standards such as those stipulated in ISO 27001 and the Protection of Personal Information Act (POPIA).

Broadly speaking, data governance refers to the management of data within any organisation and involves the development and implementation of policies, processes, and procedures to ensure data quality, security, and compliance within an institution. Furthermore, data governance defines and formalises the roles and responsibilities for ensuring accountability of data assets across the University. It encompasses the people, processes, and technologies required to manage and protect data assets.

governance?

The WHY of data governance?

Risk reduction, by means of:

- General risk management;
- Ensuring data security since cybersecurity threats are a growing concern and effective data governance helps safeguard sensitive data from breaches. To mitigate this, the UFS has secure data sharing practices and platforms for the sharing of information based on its classification; and
- Ensuring privacy.

Improving processes through:

- Regulatory compliance. Universities must comply with data privacy laws and regulations to protect sensitive information and to prevent legal repercussions. For instance, before any personal information of staff, students, identifiable research, and vendor data can be shared, consent must be obtained from the designated data owners as delineated in the governance framework policy;
- Data quality improvement. High-quality data is essential for informed decision-making and strategic planning at the University. Data governance plays a pivotal role in the business intelligence projects at the University and supports the overall digital transformation plans; and
- Metadata management.

The HOW of data governance?

Data stewardship

Data stewardship is crucial to data governance because it guarantees that data is securely stored, well-managed, and legally compliant. While reducing risks and guaranteeing responsible data management, effective data stewardship practices assist organisations in getting the most out of their data assets.

The data governance framework policy on administrative data captures this in that it clearly sets out the responsibilities of the data owners and dataset stewards. Formalising accountability is crucial in a data governance programme at any institution.

Data lifecycle management (DLM)

This involves managing data from creation through to archiving or deletion. The POPI Act plays a significant role in data lifecycle management by setting legal and regulatory requirements for how organisations ought to handle personal data throughout its lifecycle. DLM practices must align with the stipulations of the POPI Act, ensuring that personal data is collected, processed, stored, and deleted in compliance with data protection regulations. Properly integrating POPIA requirements into DLM processes helps organisations minimise risks and meet their obligations for protecting personal data.

Data policies and procedures

Policies and procedures are foundational to effective data governance. They provide a framework for managing data assets, ensuring data quality, security, and compliance, and supporting data-driven decision making and business objectives. By following established policies and procedures, the University can harness the full potential of its data while minimising risks and ensuring responsible data management.

What we are busy with

- Encryption of hard drives, Microsoft BitLocker Administration and Monitoring (MBAM)
- Facilitation of the data processing request process
- Alignment of existing UFS policies with the ISO 27001 policy framework
- Data Quality Improvement Program

Data destruction

Where the UFS is the responsible party, it has a duty in terms of POPI legislation to secure the integrity and confidentiality of personal information in its possession or under its control by observing appropriate, reasonable technical and organisational measures in order to prevent:

- Loss of, damage to or unauthorised destruction of personal information; and
- Unlawful access to or processing of personal information.

The data governance office assists with the secure destruction of personal data from hard drives and any other media. Additionally, we facilitate the process of obtaining authorisation for the processing of Personally Identifiable Information (PII) and Special Personal Information (PI) from the data owners within the organisation before any processing can be done by external parties.

Data sharing

The data governance office ensures that the processing of PII is undertaken in compliance with POPI legislation and more specifically condition 7 of the said law. To comply with this condition, only secure methods of information sharing are permitted, especially with external parties. The UFS encourages the use of OneDrive and Proofpoint to share and transfer information. Where possible, system to system sharing of information is encouraged to ensure an auditable trace and system for the transfer of information. ■

Link to Policy Documents:

<https://www.ufs.ac.za/about-the-ufs/governance/policy-documents>

Where and who are we?

The Data Governance Office is situated in the ICTS Building and is headed by Mrs. Kele Kaibe.

The role of ICTS Organisational Change Management Office

Understanding the role of **ICTS Organisational Change Management Office** (OCMO) in the Information and Communications Technology Services (ICTS) department of the University of the Free State (UFS).

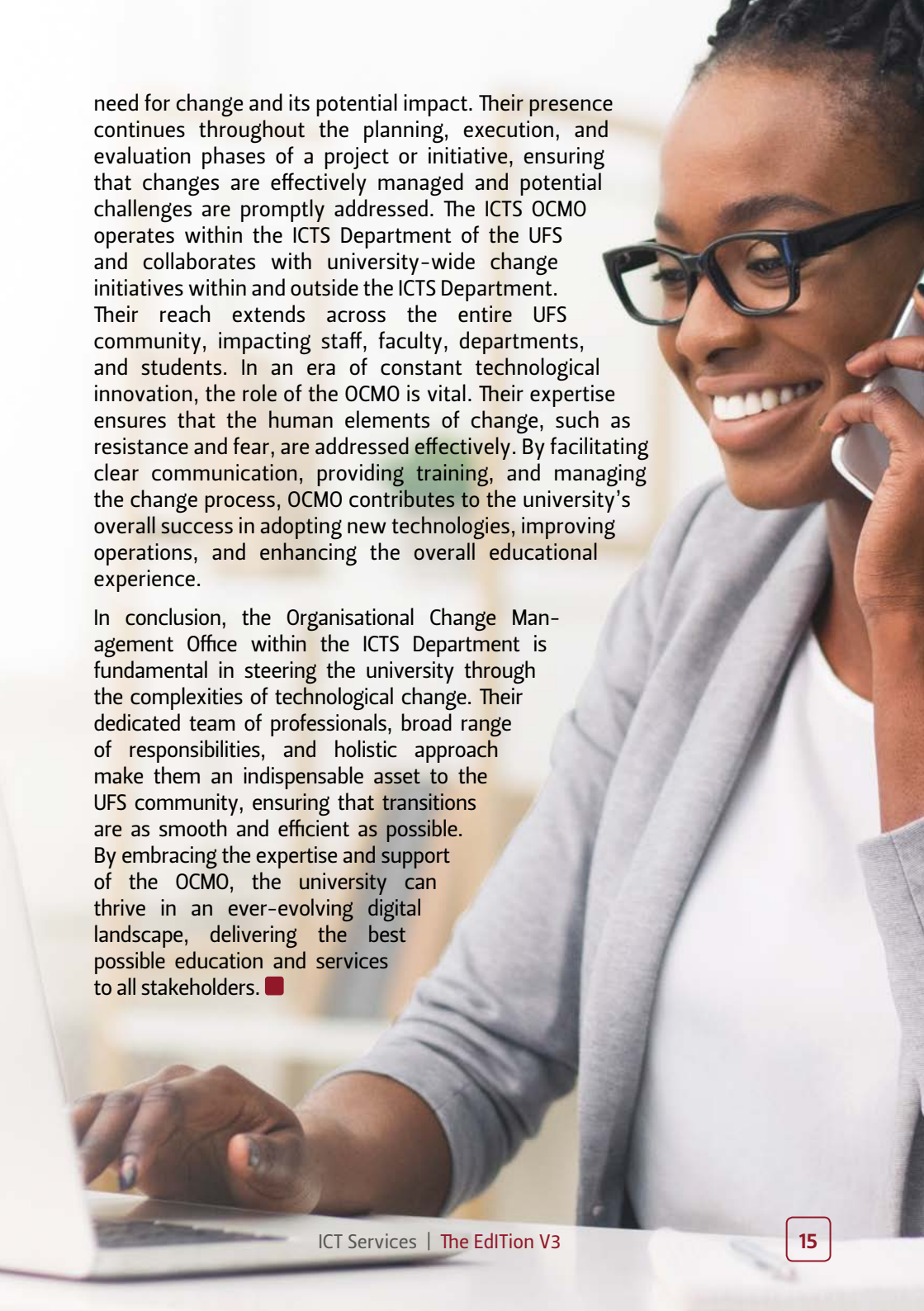
In today's rapidly evolving digital landscape, universities, like all other organisations, must adapt to constant technological advancements and operational changes. To effectively navigate these transitions, the ICTS Department of the University of the Free State has established the Organisational Change Management Office (OCMO). This article aims to shed light on who they are, what they do, when their services are needed, where they operate, and why their role is essential to the university community.

The OCMO team consists of experienced change management professionals dedicated to facilitating a smooth transition through periods of change. Led by a Change Management Leader, the team comprises change management professionals supported by a communication specialist and user training expert. They work closely with various UFS divisions, such as ICTS personnel, faculty heads and staff, and multiple other departments, to ensure that technology-related changes are effectively implemented and embraced. The OCMO's primary responsibility is to consider adding the human side of change in collaboration with Human Resources (HR) and various other stakeholders. They help identify the impact of people, processes, and technology changes on UFS staff, faculty, departments, and students and develop strategies to minimise disruption. OCMO professionals are involved in crafting communication plans, assessing stakeholder engagements, facilitating training programmes, and monitoring the progress of the change process. They serve as a bridge between technical implementation and the university community, ensuring a smooth transition and increased user adoption.

OCMO's involvement occurs at various stages throughout change initiatives. They are often engaged from the project or initiative's inception, assessing the

need for change and its potential impact. Their presence continues throughout the planning, execution, and evaluation phases of a project or initiative, ensuring that changes are effectively managed and potential challenges are promptly addressed. The ICTS OCMO operates within the ICTS Department of the UFS and collaborates with university-wide change initiatives within and outside the ICTS Department. Their reach extends across the entire UFS community, impacting staff, faculty, departments, and students. In an era of constant technological innovation, the role of the OCMO is vital. Their expertise ensures that the human elements of change, such as resistance and fear, are addressed effectively. By facilitating clear communication, providing training, and managing the change process, OCMO contributes to the university's overall success in adopting new technologies, improving operations, and enhancing the overall educational experience.

In conclusion, the Organisational Change Management Office within the ICTS Department is fundamental in steering the university through the complexities of technological change. Their dedicated team of professionals, broad range of responsibilities, and holistic approach make them an indispensable asset to the UFS community, ensuring that transitions are as smooth and efficient as possible. By embracing the expertise and support of the OCMO, the university can thrive in an ever-evolving digital landscape, delivering the best possible education and services to all stakeholders. ■



Migrating to a more sustainable service-

Internationally, self-service functionalities have become more prevalent in assisting organisations to work faster, smarter, and more sustainably. As a consumer of some of the services offered by the UFS ICT Services department, you would have noted that it is no different at our institution. In the past couple of years, ICTS has implemented various technologies to minimise your dependence on individuals. Examples include DUO Multifactor Authentication, password self-service and numerous other solutions you can access and read about when visiting <https://solveIT.ufs.ac.za>.



A service-oriented mindset, however, does not stop here. The ICTS department is now utilising predictive analytics and Artificial Intelligence (AI) platforms in the security and other service domains to anticipate potential incidents and proactively monitor digital services at the UFS. In this context, one of our goals is to minimise the time and effort users need to spend reporting issues or asking for assistance, whether it be an audio-visual classroom component that is not functioning properly, keeping you safe by blocking malicious content, or notifying and guiding you on potential security considerations when sharing content.

As we continue our journey into 2024, we want to assure you of our commitment to exploring fresh and innovative ideas. Our goal is to enhance efficiency and, in so doing, free up valuable staff resources for more impactful endeavours. One such endeavour is to use the time we save to listen to you.

oriented framework



At ICTS, we believe sustainable solutions are grounded in collaboration, not necessarily in like-minded thinking. Your support and engagement will make this journey even more rewarding, and we would like to invite you to visit us and engage with us during this year.

To experience how our services landscape has changed and what we are planning, please feel free to reach out to:

- Eugene van Wyk (VanWykEP@ufs.ac.za)
- Cora-Maré van Staden (CSmith@ufs.ac.za)
- Jacobus Kotze (KotzeJJ@ufs.ac.za)

Hope to hear from you soon. ■

A futuristic server room with glowing blue lights and a network overlay. The scene is dominated by dark server racks with glowing blue lights and a network overlay of white lines and dots. The background is a deep blue with a grid pattern of light blue squares. The overall aesthetic is high-tech and digital.

ICT Services

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