



FEDERAL HUMAN RESOURCES MODERNIZATION

BUSINESS CASE PLAYBOOK

The background of the page is white and features several faint, hand-drawn style graphics in a light gray color. These include several arrows pointing in various directions (up, down, left, right, and diagonally), several circles of varying sizes, and several 'X' marks. The graphics are scattered across the page, with a prominent horizontal arrow pointing from left to right in the middle section, and a large arrow pointing diagonally upwards from the bottom right towards the top right.

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BUSINESS CASE PLAYBOOK

Prepared by the Shared Services Leadership Coalition
in collaboration with the Office of Personnel Management,
Human Resources Quality Service Management Office.

USING THIS DOCUMENT

Prepared for the Office of Personnel Management (OPM) Human Resources Quality Service Management Office (QSMO) by the Shared Services Leadership Coalition (SSLC) Federal Human Resources Modernization Business Case Playbook Working Group in 2023, this document provides a general guide to researching and preparing winnable human resource modernization business cases. This playbook does not establish or alter any existing policies or directives issued by any government agency or regulatory body, but rather proposes a streamlined, unified approach to building modernization business cases that can be assessed for performance and validated for usability over time.

This playbook is intended to assist federal agencies in effectively planning, funding, and implementing modernization activities to meet emerging and future human resource demands. Effective modernization planning requires a deep understanding of an agency's present operating environment (current state), clear identification of impediments to meeting existing and / or anticipated demands (gap), and the identification of specific benefits to be realized through modernization (future state).

This playbook is organized into three sections:

- 1) Preparing an agency to engage in a modernization activity to ensure readiness.
- 2) Selecting the most appropriate and realizable outcomes of a proposed modernization activity.
- 3) Building a winning business case.

Appendices contain descriptions of HR-related outcome and output measures and references to related guidance and reports on modernizing government human capital management functions.

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1 INTRODUCTION

The purpose of the **Federal Human Resources Modernization Business Case Playbook** is to help users increase the probability of securing modernization activity approval and supporting funding by preparing a strong and effective business case. The playbook provides a guide for federal government decision makers to prepare winning business cases for human resource (HR) modernization activities by focusing on gap identification, outcome selection and cost consideration.

The playbook focuses on practical guidance for:

- 1) Shaping the modernization effort by identifying gaps between the current and future state operations,
- 2) Identifying and selecting the outcomes(s) against which business cases are developed, and
- 3) Developing a comprehensive, evidence-based business case document that is both defensible and actionable.

For the purposes of this playbook the term 'outcome' refers to both outputs [results of production] and outcomes [changes to operating conditions] collectively. Each output's benefit thus is considered as either an improvement to production or change to the operating environment that provides the agency an advantage or efficiency in achieving its mission.

Note, that additional planning, and documentation are likely when business cases are tied to external funding (e.g., Budget Requests, Technology Modernization Fund). And while a strong business case presents an evidence-based argument in favor of modernization and points to the benefits of the modernization action, it may not alone be suitable to obtain the necessary funding to support the modernization activity.

It must also be noted that not all modernization activities will require funding beyond an agency's operational budget. For example, the adoption of governmentwide human resource service measures, such as those promulgated by the **Human Resource Quality Service Management Office (HR QSMO)**, and advocated by the **HR Line of Business** may allow agencies to simply shift into a uniform method of performing human resource work to improve its timeliness, efficiency and accuracy, thereby modernizing its human resource services.

1.1 Purpose of Modernization

Modernization may be defined quite simply as an improvement that makes a business more efficient. This can be accomplished by replacing or upgrading outdated skills, processes, or technologies. It may also be accomplished by adding or expanding service lines, improving customer service, responding to legislative or policy mandates, or a general desire to make operations more efficient, effective, or credible. For the purposes of this playbook, modernization is defined as, **'the progressive transition from traditional**

business practices (i.e., organizational structure, transactional processes and procedures, workforce competencies and qualifications, and legacy technologies) to more current practices that provide an operational advantage to performance (i.e., quality, timeliness, satisfaction) and possibly cost efficiency.'

A progressive or incremental approach to modernization, much like an agile approach to a technology implementation, may allow an agency to control the risk of change, take advantage of limited operational readiness, or reduce the investment request up front, while iteratively proving value or demonstrating returns on investment within the context of a broader enterprise improvement.

In the federal administrative context modernization is often associated with “buying a service,” as defined by the *Modernization and Migration Management (M3) Playbook*. While modernization may entail a purchasing action, modernization is not necessarily a buying activity, rather an improvement activity that may be realized through hiring, training, process reengineering, or system upgrades/replacement. Obviously, such activities have a cost component, in that change requires a level of effort, and that level of effort has a price.

Lastly, modernization proposes a change in mindset, wherein decision makers, managers and front-line workers willingly adopt new modes of performing traditional work for the express purpose of improving performance, replacing unnecessary legacy processes or technologies, and freeing up time to take on new activities.

1.2 Purpose of a Business Case

The primary purpose of a business case is to provide information on changes proposed, justification, benefits, investment (in time and resources), and risks associated with a modernization proposal. A well-crafted business case provides the basis for effective decision making.

Further, a business case captures the reasoning for initiating an investment and must support a specific, demonstrable business need. That is, the business case provides not only a clearly defined business need, but a modernization activity that is designed specifically to meet that need. And of course, as the business case identifies specific, related benefits, the ongoing viability of the modernization activity can continue to be measured against it.

Preparers of business cases should keep in mind that their work will be evaluated to ensure:

- The purpose and justifications are clear and well supported.
- Alternatives are clearly identified and profiled.
- Impending needs, burning platforms, and critical timelines are well defined.
- Requested funding is logical, justified, and returns on investment are clarified.
- Major risks are identified, and effective mitigation practices are described.
- The modernization investment demonstrates value, relevance, and importance for the agency or the government.
- The implementation of the modernization is properly communicated and managed.
- The agency has the capability to deliver the benefits of the proposed modernization.
- The agency's resources are working on the highest value opportunities.
- Modernization inter-dependencies are identified, and activities are optimally sequenced to promote continuous improvement.

2 PREPARING TO MODERNIZE

In preparing to modernize, agencies may have more success, both in terms of gaining approval to proceed and in obtaining funding for the improvement activity by starting small. In this context, small is relative to an agency's tolerance for change. Small may mean limiting resources necessary to perform modernization work, constraining the modernization work to a level that is easier to manage, or identifying an outcome that may be easier to achieve.

Taking an incremental approach to realizing progressive improvement, agencies may choose to start with a pilot project. Pilot projects should address specific, visible business needs to establish a more immediate outcome that both establishes a repeatable process for designing and implementing modernization efforts, but also demonstrates the value to change. Additionally, pilot projects help keep the modernization scope small so that it can deliver results more quickly and risks can be more easily managed.

2.1 Defining the Why

Why or reasons to modernize (the business problem) may very often be couched in terms of mission performance, to include the ability to compete for talent, to fill critical roles and perform essential work, at a high level of quality and in a timely manner to meet the demands of internal mission-support or mission-centric activities. It may also rest in retaining key talent and developing it into future agency decision makers and leaders.

When considering the why, it is important to remember that the agency may have limited resources to allocate and must balance those resources between essential modernization and 'nice to have' upgrades. There will always be competing priorities, perspectives and expectations, and a successful business case will need to balance each to present a clear and defensible why.

The business problem to be solved through modernization is rooted in the context associated with the various outcomes (see Section 4). That is, an agency needing to fill critical vacancies to perform mission critical work may have a problem finding talent, which is a recruiting challenge, or it may have a problem getting qualified candidates hired and onboarded so they can perform the work. While modernization activities to address either scenario will ultimately lead to filled vacancies and increased production, a business case requesting funding to modernize the hiring process will not be successful if suitable candidates are not being identified for vacant positions.

2.2 Assessing Readiness

Readiness may be defined in a variety of ways, but generally it is oriented to availability of funding and personnel to support the modernization activity. However, it must also consider the regulatory (i.e., policies, standards, directives, procedures) and technology environments and whether either can support a change.

Highly beneficial to supporting a modernization argument is to precisely define the current operating environment. This should include mapping the full human resource lifecycle (see Section 3.4), to clearly identify potential elements for change, expose their element interdependencies, and define other dependencies that will need to be addressed as part of the modernization effort.

Using tools such as the *Introduction to Modernization and Migration Management (M3) Playbook* may help agencies understand the end-to-end process of modernization, as well as determining agency readiness based on the definition of business, functional and technical requirements.

2.3 Developing the Value Proposition

Breaking the whole modernization activity into an initial pilot and subsequent bite-sized projects may reduce some of the risk associated with change and help more clearly align success criteria (outputs and outcomes) to overarching human resource strategies or plans, such as the agency's Human Capital Operating Plan (HCOP) or Diversity, Equity, Inclusion and Accessibility (DEIA) Strategic Plan.

A strong value proposition should include the specific benefit, uniqueness, and feasibility of the modernization activity, while addressing the needs of stakeholders. Start by precisely stating the problem (e.g., excessive time between job posting and initial offer) in the context of the current state (e.g., loss of viable candidates while waiting for initial offers) that the modernization activity will solve, the impact the problem is currently posing (the gap), the output (resolution) of addressing the problem through modernization, and the outcome (benefit) for the agency.

3 CONSIDERATIONS

Modernizing federal human resources tends to focus on technology upgrades to realize enterprise management capabilities, the integration of the variety of human resource processes, from talent acquisition to benefits management, or the automation of transactional processes to improve timeliness, accuracy, efficiency, and overcome staffing challenges. Modernization, however, to be truly meaningful should consider all aspects of acquiring, managing, and developing the federal workforce to ensure the acquisition and retention of high talent, the advancement of talent to the senior most decisional levels and the design and sustainment of highly collaborative, inclusive, and sensitive work cultures. Modernization then is quite simply, about finding a better way to do business that results in a more skilled, prepared, resilient and productive mission workforce.

3.1 Funding Sources

Funding for modernization activities may come in a variety of forms, and the winning business case may need to identify multiple streams of funding to meet the modernization need. Whatever the source of funding identified, modernization advocates and preparers of modernization business cases should always collaborate with their budget officers to ensure funding lines are available, restrictions and requirements on different sources of funding can successfully be satisfied by the modernization project, and that there is a financial advocate for the intended change.

Funding sources may be very generically categorized as follows:

SOURCE	DESCRIPTION	CONSIDERATIONS
Operational Budget	Operational budgets are routine funding generated through annual apportionment and obligation of appropriated funds to operate agency programs.	Redirecting routine, or standard operating funds is the easiest way to fund a modernization activity, but consideration must be given to the routine activities that may not receive their typically budgeted amounts.
Direct Appropriation	Budget authority granted to an agency through the annual appropriations process to fund a specific activity or program.	Direct appropriations are generally authorized for large-scale, enterprise-wide investments.
End of Year Money	End of year money the agency Chief Financial Officer (CFO) has 'swept' back (funds that remain unobligated or were de-obligated) and must be re-obligated before the end of the fiscal year.	Competition for single use, end of year money is always high, and there is no guarantee that funds will remain unobligated at the end of the fiscal year.
Revolving Funds	Revolving funds (i.e., working capital funds, franchise funds) are department managed assets that provide for, among other expenditures, capital investments.	Requesting capital investment funding may be approved as part of the annual budgeting cycle and requires planners to identify modernization activities in advance.
Customer Fees	Customer fees are generated from agencies authorized to pay for services through 'fee-for-service' arrangements with designated service providers.	Baking modernization costs into customer fees will require customer or working capital fund approval prior to making the rate change. Because customers prepare their annual budgets based on agreed upon rates with the servicing agency, customers may not have the ability to increase their obligations to cover modernization investments.
Interagency Agreement	Interagency agreements (IAA) provide a reimbursable relationship between two agencies.	An IAA creates a fiscal obligation between agencies and provides for specific product or service requirements. Having a single customer agency fund a modernization activity may necessitate that agency have greater influence over the modernization design and thus outcomes.
Technology Modernization Funds	Technology modernization funds (TMF) are available to federal agencies for the purpose of modernizing their technology portfolios.	TMF funding is limited to technology modernizations and requires significant effort preparing initial project proposals (IPP) and full project proposals (FPP). Further, TMF prioritizes funding to improve mission critical services and those projects that serve as a common solution or may be reused.
Industry Partnerships	Industry partnerships, commonly known as Public-Private Partnerships (P3), is a joint relationship between an agency and a private company. P3s can be revenue or non-revenue generating agreements, wherein both parties contribute their own funding and resources.	P3s require strong governance to avoid the relationship devolving into a contract relationship, wherein the sharing of risk, decision making, and accountability would fall to the government.

3.2 Cost to Operate

The cost of operating human resource activities within the federal government are often focused on the cost to hire a new employee and the cost of replacing an existing employee. Other costs, however, can be very meaningful to an agency and present an opportunity to realize cost efficiencies by taking on smaller, or incremental modernization activities.

As noted in *Transforming the Governance of Federal Human Capital Management* the cost of performing human resource services in the federal government far outweighs that of the private sector. In some cases, the cost per human resource transaction may be 50 to 80 percent higher and the cost to hire over 50 percent higher for the federal government. Additionally, the private sector, due to increased process efficiency, can manage larger workforces with less human resource staff. On average private sector organizations have one human resource specialist for every 75 to 100 personnel, while the federal government has on average one such specialist for only 53 personnel.

Detailing the cost to operate within the business case will help establish a basis for cost efficiencies over time, even if the total expenditure is expected to remain static, as the productivity of the work unit increases.

3.2.1 Financial Model

Constructing a financial model to summarize the agency's current human resource operating expenses and throughput against key functions (e.g., recruiting and hiring, onboarding, retirement) will help the business case preparer present a comprehensive financial picture to inform decision makers. The financial model should incorporate expense trends to demonstrate both the history behind the current state and the prediction against the future state (post modernization).

The financial model should capture:

- Human resource operating costs in the current state, to include labor (fully burdened), technology operations and maintenance, and facilities management.
- Modernization investment as both direct expenditures (technology, labor, consulting services) and indirect expenditures (support from other organizational functions, such as information technology, financial management, acquisitions).
- Cost savings derived from modernization effort (e.g., reduced headcount, reduced operations and maintenance).

3.3 Mapping the Current State

When embarking on a human resources modernization activity, an agency should clearly define its current state of operations ('as-is'), as well as its desired future state ('to-be'). The gap between the two states thus defines the scope of potential modernization. However, as noted in the previous section, an agency will often be best served by adopting an incremental approach and limit its initial modernization activities to those that fall within the bounds of decisional tolerance, as well as available funding.

Often, without a useful referent, future states become best guesses, rather than clearly designed states with deliberate actions and specific outcomes defined. Governmentwide lifecycle models can help an agency define its future state in terms of agreed upon functions and / or sub-functions to be modernized, and then align the most appropriate outcomes to the modernization effort using the also agreed upon service measures.

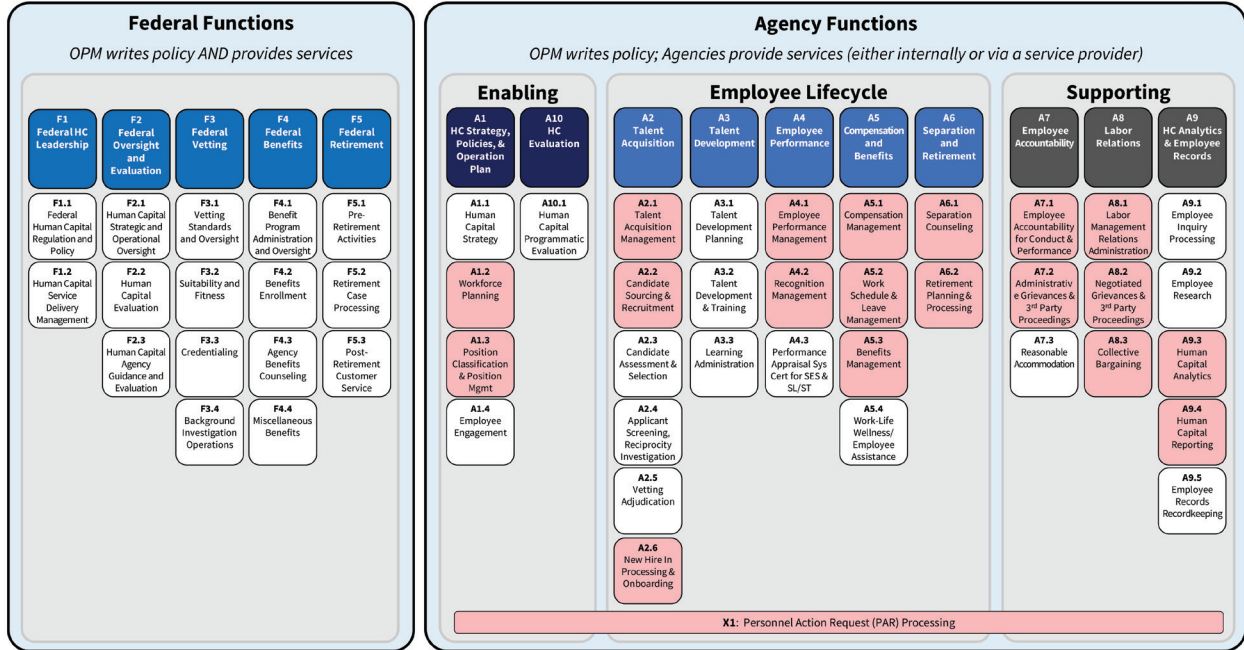
3.4 Operational Lifecycle

The *Federal Human Capital Business Reference Model* (HCBRM) defines the lifecycle of governmentwide human resource operations, providing 15 functions and 54 sub-functions against which an agency can focus its modernization effort. The below graphic is the HCBRM 4.0:



HCBRM 4.0

The Human Capital Business Reference Model (HCBRM) functional framework defines Federal Human Capital Management. This map represents the 16 Functions and 50 Sub-functions in the HC lifecycle.



3.5 Service Measures

The *Human Resource Management Service Measures* provide discrete measures for timely, efficient, and accurate human resource service delivery. As detailed in *Measuring the Business Value of Shared Services* a measure is an indicator of actual performance against a standard and targets are used to demonstrate efficiency and effectiveness. “ In the context of making a business case for human resource modernization, the service measures define the future state (‘to-be’) and help an agency quantify the desired or anticipated change (modernization) in the measure once the activity is complete. The table below provides a sample of human resource service measures:

SERVICE ACTIVITY ID AND NAME	SERVICE MEASURE DISCIPTION	SERVICE MEASURE TYPE	SERVICE MEASUREMENT FORMULA
HCM.A2-1.010 Recruitment Strategy Development	Determines whether the agency has adopted (i.e., written, approved, communicated to employees, and implemented) a TA strategy that includes overarching goals and priorities.	Compliance	Was the TA strategy developed based on federal and agency hiring needs and priorities? Yes/No Have the TA goals and priorities been written in accordance with federal regulations and guidelines? Yes/No Have the TA goals and priorities been signed and approved by the appropriate authority? Yes/No Have the TA goals and priorities been based on/informed by a competency assessment and/ or workforce planning program? Yes/No Have the TA goals and priorities been informed by the employee labor union(s) and/or collective bargaining agreement priorities, if applicable? Yes/No Have the TA goals and priorities been communicated to employees? Yes/No Have the TA objectives, goals and priorities been evaluated for progress and updated as necessary
HCM.A2-1.010 Recruitment Strategy Development	Measures whether the service provider has met all the published federal business requirements for the service in question.	Compliance	Has the service provider met all published federal business requirements for the service in question? Yes/No
HCM.A2-1.020 Recruitment Plan Development	Measures agency leadership satisfaction and other perceptions of the agency recruitment plan.	Satisfaction	Overall, how satisfied are you with the recruitment plan for the current fiscal year (e.g., recruiting methods, sources/events, resource allocation, and timelines) Agency leadership and agency accountability office responses to recruitment survey
HCM.A2-1.020 Recruitment Plan Development	Measures agency leadership satisfaction and other perceptions of the agency recruitment plan.	Satisfaction	To what extent does the recruitment plan align with the prioritized objectives outlined in the agency Talent Acquisition strategy while accounting for agency constraints? Agency leadership and agency accountability office responses to recruitment survey
HCM.A2-1.020 Recruitment Plan Development	Measures whether the service provider has met all the published federal business requirements for the service in question.	Compliance	Has the service provider met all published federal business requirements for the service in question? Yes/No
HCM.A2-1.030 Position Classification	Measures the agency quality control audit Efficiency (e.g., results for position classifications.	Efficiency (e.g., Timelines, Accuracy)	Numerator: Total number of audited (e.g., DEU audit, agency Human Capital management evaluation) forms containing errors (e.g., title series or grade error, FLSA error) in the last fiscal year. Denominator: Total number of OF-8 forms audit ed in the last fiscal year
HCM.A2-1.030 Position Classification	Measures the extent to which the position classification process meets the needs of the hiring manager.	Satisfaction	To what extent did the position classification process meet your needs (e.g., time to complete, collaboration with you, clarity of information provided)? Hiring manager responses to hiring survey
HCM.A2-1.030 Position Classification	Measures whether the service provider has met all the published federal business requirements for the service in question.	Compliance	Has the service provider met all published federal business requirements for the service in question? Yes/No

4 MODERNIZATION OUTCOMES

Modernization benefits are described as the outcomes that will allow an agency to realize change and to improve operations to better meet its mission requirements. Outcomes provide the rationale for modernizing, as well as a means of measuring whether the modernization effort was successful.

Selecting outcomes before preparing a modernization business case will help ensure the right expectations are defined based on the challenges or limitations the modernization activity plans to overcome. By selecting the most appropriate outcomes based on current state operational challenges, the modernization activity will be designed specifically to realize a necessary future state and will help agencies avoid extraneous or unnecessary investment in time or money.

It is important to note that while the benefits of providing better HR services to federal employees are substantial, it may not always be easy to directly quantify the monetary value of improvements. While monetary value specifically may be difficult to quantify, clearly enumerating impact remains critical. Agencies may use a combination of key performance indicators (KPIs), service measures, cost-benefit analysis, and other metrics to assess the impact of enhanced HR services on mission performance. Further, the positive effects of improved HR services typically extend beyond cost efficiencies by contributing to the overall health of an agency and the wellness of its workforce. Engaging key stakeholders will be necessary to select and define the value of the modernization activity.

Note, the outcomes provided in the following sections are intended to be information technology (IT) agnostic. While the necessity to move to new IT platforms may be a driver of modernization, system selection alone should not be used as justification. That is, while the outcomes realized from modernization may be derived in part due to upgrades or enhancements in the IT environment, selection of technology should always follow an understanding of the impact desired and should never be the starting point of a modernization plan. As such, it is essential that human resource service owners partner with agency technology leads to identify and reconcile any opportunities or limitations that may impact the modernization activity.

4.1 Outcomes

Modernization is not always, or only about cost efficiencies, either cost savings or cost avoidance. In fact, agencies can often suffer double expense during implementation due to sustaining legacy processes or procedures while implementing and testing new ways of doing business. Outcomes should be considered then, as noted above, as **improvements to productivity or changes to the operating environment**. While the downstream impact of realizing these types of outcomes will be an increased ability to perform mission activities effectively and efficiently, improved mission accomplishment should not be used as the sole direct outcome of a modernization activity.

To effectively set modernization targets, agencies should try to gather at least two years of performance data, more if available. Understanding what other changes will be made in or to the operating environment during the performance period will also be helpful in estimating realistic outcomes and prescribing achievable, but meaningful targets.

Generally, outcomes related to improved human resource **productivity** represent improvements in human resource service quality and timeliness, and might include decreased processing times, reduction in errors, and increased compliance, while outcomes related to changes in the operating environment might include improved customer, user or employee satisfaction due to higher quality service delivery, and the ability to consolidate and share workforce data by following unified standards or service measures.

4.2 Sample Outcomes

This section presents a sample of common human resource modernization outcomes, and two potential costs of not modernizing, with their description, context, measure, metrics, benefits, and risks if not realized.

NOTE: This is not an exhaustive list of outcomes nor are the sample measures comprehensive, they are rather provided as examples of how an agency might define and quantify its modernization effort. Agencies should be careful to place the outcomes, benefits, and measures in the context of their organization, based on their current state of operations, their gaps, and their future state as defined.

4.2.1 INCREASED SPEED TO HIRE			
Increased speed to hire can be measured in a variety of ways, to include either as a lifecycle or segment activity. To define the outcome, agencies must first define the starting point (e.g., from the submission of the job requisition, creation of the job analysis, or receipt of the certificate of eligibles by the customer) and the ending point (e.g., acceptance of the job offers, starting date, completion of onboarding).			
Modernization Context	Modernized human resource information systems (HRIS) and integrated workflows (e.g., streamlined hiring processes) enhance the value delivered to the customer by successfully hiring the most qualified candidate in a more efficient and effective manner. Additionally, modernization and integration may help maximize information sharing in real-time and optimizing management (performance and oversight) of work throughout the hiring workflow.		
Operational Driver	Beyond posing challenges to performing routine mission activities under normal operating conditions, lagging speed to hire further negates an agency's ability to rapidly expand its workforce when faced with emerging administrative demands (e.g., infrastructure funding) or public service necessities (e.g., COVID-19 pandemic). Long term gaps to staffing have both a negative impact on employee morale through unrealistic production expectations and may lead to increased attrition and / or contract spending to acquire the needed talent, even if only temporarily.		
Anticipated Benefit	Increased speed to hire means an agency does not suffer long term vacancies that negatively impact productivity, which cause project delays or require outsourcing to complete work in a timely manner. Shortened hire times also improves the quality of the hires since the best candidates often have multiple offers in a short time span and it minimizes the probability a selected or preferred candidate will take another offer.		
Desired Outcome	The objective of this outcome is to reduce the time in either total labor hours expended, or duration of activities spent obtaining new employees. The increase in speed to hire may also reduce the total labor hours expenditure and thus likewise reduce the cost per hire.	Output Measure(s)	<ol style="list-style-type: none"> 1. Reduced total time (e.g., days elapsed, hours preparing hiring package) spent recruiting and selecting new employees (lifecycle: from job requisition to onboarding). 2. Reduced total time to select and onboard new employees (segment: from receipt of certificate of eligibles by the customer to selection and onboarding).
		Outcome Measure(s)	<ol style="list-style-type: none"> 1. Sufficient staffing to conduct routine business operations and perform mission activities. 2. Ability to acquire sufficient and appropriate talent to perform mission activities.
Risk of Not Modernizing	Perpetually lagging speed to hire will ultimately put an agency at risk of not successfully performing its mission due to the lack of the necessary subject matter experts (SME) to lead mission activities. Further, the lack of SMEs is detrimental to the internal development of talent necessary to support meaningful succession planning to ensure consistency of operations over time and promote critical knowledge retention.		

4.2.2 INCREASED PROCESS INTEGRATION, QUALITY AND TIMELINESS

Increased process integration is the product of aligning lifecycle activities and integration transition points to streamline the exchange or progress of information through a cycle, while quality and timeliness are the results of a more efficient lifecycle that has quality control and quality assurance mechanisms in place to flag errors.

Modernization Context	Modern HR systems tend to integrate functions in a way that reduces the need for handoffs and reduces the overall number of systems. In addition, technology upgrades that maximize automation and integration of systems and processes reduce time spent on previously manual efforts, to include quality control (in-line error checking) and reporting.		
Operational Driver	Focusing on process integration requires agencies to go beyond delivering cost efficiencies and cost reductions but enables the broader ability for human resource managers to control cost exposure, accelerate digital capabilities, and leverage purchasing power using shared services and modern talent management-based solutions. Integrated systems are easier to learn, use, and maintain, and update. Integrating the systems and processes reduce the risk of data errors and provide a better user experience.		
Anticipated Benefit	The primary benefit of integration though is timeliness of processing, by the elimination of 'choke points' or 'stovepipes,' which restrict the movement of the action through the processing cycle. Further, stovepipes create 'blindness' that inhibit human resource specialists from seeing transactional work from a broader perspective that allows them to spot potential issues and correct errors in real time without having to return work to a previous stage in the cycle.		
Desired Outcome	The objective of the outcome is to reduce processing errors (improved quality) and decrease processing time (increased timeliness). Improvement of which will return a time savings to human resource specialists performing work within an integrated process, thus allowing them to increase throughput (more actions in a static period).	Output Measure(s)	<ol style="list-style-type: none"> 1. Reduced error rates requiring rework. 2. Reduced corrective actions after processing. 3. Reduced time to complete actions. 4. Reduced staff necessary to perform transactional work.
		Outcome Measure(s)	<ol style="list-style-type: none"> 1. Increased process efficiency (reduction in adoption time, increased system proficiency, etc.). 2. Improved user experience, attrition rates, employee satisfaction, and process cycle times. 3. Reduced systems in HRIS technology inventory and (potential for) decreased operations and maintenance costs.
Risk of Not Modernizing	The complexity of stovepipe processes, the redundancy of processing actions and the inability to rapidly identify errors negatively impacts the effectiveness of the process, while also exacerbating the processing and system learning curve of incoming personnel, increasing the risk of data errors, causing transaction stall, and ultimately leading to negative user and customer experiences.		

4.2.3 INCREASED POLICY COMPLIANCE

Increased policy compliance is the result of adapting in near real time changes in policy, regulation, and operating procedures to comply with governmentwide, department or agency mandates, providing fair and equitable management of agencies and supervision of federal employees in accordance with standing human resource laws, and properly using governmentwide systems and protecting sensitive data, such as customer, user and employee personally identifiable information (PII) and public health information (PHI).

Modernization Context	Modern HR systems improve policy compliance because they are adaptable, configurable, and integrated. As a result, they improve traceability and auditability of human resource outcomes and reduce the demand for labor hours dedicated to policy assurance and audit response.		
Operational Driver	Focusing on compliance means agencies take a risk-based approach to either correct non-compliant actions or to take steps to avoid compliance issues from arising often through quality control type activities. Compliant decisions and actions, regardless of the regulatory context are defensible and contribute to the reputation of the agency as providing fair and equal services to the public and treatment to employees, ensuring that sensitive data is protected and that data systems are secure, contributing to the physical and psychologically safety of employees.		
Anticipated Benefit	The benefit of ensuring compliance within the federal human resource activity may include retention of hiring authorities, access to funding, and a positive reputation as an employer. Additionally, compliant human resources practices protect the agency from human resource, equal opportunity and discrimination complaints resulting in investigations and potentially lawsuits that increase workloads, often require outside resources, and may have a direct impact on the agency's budget.		
Desired Outcome	The primary objective of this outcome is avoidance of non-compliant actions from occurring and giving rise to specific complaints, allegations, and legal actions. The secondary objective of this outcome to 'pass' human resource, financial and technology audits.	Output Measure(s)	<ol style="list-style-type: none"> 1. Elimination of non-compliant hiring actions. 2. Reduction of human resource, equal opportunity, etc., complaints resulting from policy non-compliance. 3. Accomplishment of Diversity, Equity, Inclusion and Accessibility (DEIA) goals. 4. Reduction of sensitive data breaches or exposures.
		Outcome Measure(s)	<ol style="list-style-type: none"> 1. Increased policy responsiveness (reduced time lag between policy mandate and demonstratable agency compliance). 2. Reduction in human resource, financial and technology audit findings. 3. Retention of hiring authorities, funding authorities, and authorities to operate technology.
Risk of Not Modernizing	The burden of non-compliance in any context is additional effort with static resources, that ultimately degrades routine productivity and performance within the immediate agency, while likewise negatively impacting its ability to deliver public services as defined by its mission. Further, mitigating compliance risks and avoiding allegations of misconduct and legal claims protects the agency from negative public opinion, which can degrade its ability to attract and retain talent, perform services, and maintain public service credibility.		

4.2.4 IMPROVED CUSTOMER AND EMPLOYEE EXPERIENCE

Improved customer and employee experience results from a human-centered approach to operations that considers tasks and activities from the perspective of the individuals performing the work and the audiences receiving the products or services (collectively, 'users'). To define the outcome, agencies first identify the user group performing, consuming, or using the service, and then designing policies, processes and system requirements for technologies that account for and promote a positive interaction (experience).

<p>Modernization Context</p>	<p>Modernized human resource systems and processes increase opportunities for customer and employee self-service, to include task initiation, data validation and approvals. This reduces the time demand on human resource specialists and enhances quality and timeliness control, thus reducing complaints, and improving issue resolution, upgrading overall customer or employee satisfaction. To the extent that modern HR systems are software-as-a-service (SaaS)-based, they also improve employee experience because new features are deployed on a more frequent basis as part of a just in time service delivery model.</p>		
<p>Operational Driver</p>	<p>Focusing on the user experience of customers and employees means that all operational aspects are subject to assessment, evaluation, and upgrade to ensure they are not negatively impacting the user population. While experience includes user 'satisfaction,' it must also consider impact on users in terms of their productivity, performance, and safety (physical and psychological), as well as the agency's achievement of an objective or goal (e.g., retention, diversity or workforce, innovation).</p>		
<p>Anticipated Benefit</p>	<p>The benefit of improved user experience is increased productivity (employee) and consumption (customer). This is accomplished by eliminating or at least reducing the friction inherent in human interaction with inanimate policies, processes, and systems. Reduced stress (resulting from difficult to operate systems, cumbersome policies, and difficult people) results in a shallower learning curve, increased attentiveness to quality, less interpersonal conflict, and ultimately timelier turnaround.</p>		
<p>Desired Outcome</p>	<p>The primary objective of this outcome to create the most positive user experience by making by taking a human-centered approach to all business operations from production to consumption.</p>	<p>Output Measure(s)</p>	<ol style="list-style-type: none"> 1. Increased production (providing more services to more customers in the same or less time). 2. Increased quality (less errors, rework, or corrections). 3. Reduced status queries or complaints (workforce, customer).
<p>Outcome Measure(s)</p>		<ol style="list-style-type: none"> 1. Increased satisfaction (demonstrated through employee and customer surveys). 2. Decreased absenteeism (employees needing mental health days). 3. Increased retention (of both employees and customers). 4. Increased mission and operational impact (demonstrated through customer desk audits). 	
<p>Risk of Not Modernizing</p>	<p>Pervasive dissatisfaction of employees and customers leads to a host of risks, not least of which is retention. Retaining high value talent is critical to performing the work of government and delivering quality public services, and while customers may not have other options, they do have the ability to complain to agency and department executives, fostering excessive oversight and increased layers of management.</p>		

4.2.5 IMPROVED WORKFORCE INTELLIGENCE SHARING

Improved workforce intelligence (e.g., human resource data, employee satisfaction surveys) sharing starts with standardization of data inputs to generate common data sets that can be aggregated and compared to provide a more comprehensive understanding of the federal workforce and an agency's position within the governmentwide context. To define the outcome, agencies need to understand workforce data from two perspectives, the data they can produce and the data they need to import.

Modernization Context	Modernized human resource systems either centralize or unify data storage capabilities, which fosters standardized data dictionaries, reporting protocols and search engine indexing to streamline information access, validation, and comparison. This, in turn, supports real-time inputs to critical human resource decision making.		
Operational Driver	Human resource data and analysis informs all manner of workforce decision making (e.g., staff planning, succession planning, training, and development). But these decisions are not limited to the agency, rather broader federal workforce decisions made through the Office of Personnel Management (OPM), Congress and the White House must all flow down to the individual agency for implementation. To get to more cost-efficient models of production, agencies must first have a unified data understanding to drive the requirements and design a centralized or shared service solution.		
Anticipated Benefit	The benefit of increased workforce data sharing includes the ability to invest in emerging technologies (e.g., machine learning) capable of consuming large volumes of data from multiple sources and making predictions about future operational demands. But advanced workforce data capabilities and sharing does not just impact employee decision making, rather it can influence all business decisions across the enterprise.		
Desired Outcome	The objective of this outcome is increased decision competence and resilience for all business decisions, as well as a deeper understanding of the workforce's ability, capacity and tolerance for work, the organization culture, and their overarching experience as federal employees.	Output Measure(s)	<ol style="list-style-type: none"> 1. Adoption of common (governmentwide) human resource standards. 2. Data-evidenced decision making to improve human resource operations. 3. Improved alignment of employees performing human resources work and enhanced workload management. 4. Increased confidence in governmentwide workforce data and human resource trends.
		Outcome Measure(s)	<ol style="list-style-type: none"> 1. Acquiring 'future-fit' workforces able to meet anticipated demands without significant retraining or development. 2. Shared investment in future talent development (e.g., school programs, internships).
Risk of Not Modernizing	The continuance of isolated or unique data sets degrades both the governmentwide effort to create and sustain a model workforce for the future through a broader understand of the employee experience, but an agency's capacity to rapidly meet its own emerging demands with increased competition for talent with the private sector, the ability to quickly identify and meaningfully address workforce issues that may degrade productivity, and the ability to predict future necessities.		

4.2.6 INCREASED HRIS AND NETWORK SECURITY (CYBERSECURITY)

Increased human resource information system (HRIS) security includes implementing and managing system and network access and usage controls and data storage protocols, as well as protecting systems from incursion through deliberate breaches (i.e., system hacking, data leaks) or inadvertent exposures (i.e., data loss, data spillage) that compromise an agency's ability to protect at least sensitive, if not classified employee information.

<p>Modernization Context</p>	<p>Modernized human resource information systems (HRIS) and software-as-a-service (SaaS) are specifically engineered with enhanced security features driven by governmentwide mandates that are focused on ensuring timely system updates, proper access to and controlling the use of agency and governmentwide systems by only credentialed users, and protecting sensitive employee data, such as personally identifiable information (PII) and public health information (PHI).</p>		
<p>Operational Driver</p>	<p>Human resource technologies maintain a wide variety of exploitable employee data (i.e., social security numbers, home addresses, bank account information, leave and earning statements, insurance policies) desirable by a variety of malicious actors that may pose severe financial and legal risks for employees. Lack of adequate protection of sensitive employee data may also impact the ability of an agency to recruit and retain talent, maintain public trust, or retain operational autonomy within the governmentwide context.</p>		
<p>Anticipated Benefit</p>	<p>The benefit of increased system and data protection is twofold: compliance with governmentwide, department or agency cybersecurity regulations, and employee safety (both physical and psychological). An employee's trust in an agency is heavily dependent on the care of their PII and PHI and is often perceived more broadly as reflecting the value an agency places on its employees. Further, inadequate data and technology security may pose significant stress on employees that in turn degrades their productivity and performance.</p>		
<p>Desired Outcome</p> <p>The objective of this outcome is increased confidence in the agency to actively protect its employees from harm, which influences overall trust, retention, satisfaction and ultimately productivity.</p>	<p>Output Measure(s)</p>	<ol style="list-style-type: none"> 1. Compliance with governmentwide cybersecurity mandates and protocols. 2. Reduction in employee data loss through outdated, interoperable systems. 3. Reduction in employee data spillage. 4. Reduction in employee data incursion through breach. 	
	<p>Outcome Measure(s)</p>	<ol style="list-style-type: none"> 1. Increased employee trust in agency (through positive perception of safe working environment). 2. Future ability to integrate modernized systems and networks due to uniform security postures. 	
<p>Risk of Not Modernizing</p>	<p>Outmoded legacy systems not only seriously degrade productivity, information sharing and decision making, but significantly influence employee experiences of trust in their agency and perceptions of safety, thus increasing attrition, complaints and ultimately the ability to recruit new talent. Further, non-compliant systems may pose a risk to agency autonomy and its ability to deliver public services in accordance with its mission.</p>		

4.3 Cost of Not Modernizing

While there are numerous benefits of modernization, many in fact beyond the examples provided in the previous section, there are also risks or costs associated with taking no action at all, particularly as it relates to human resource information systems (HRIS). Often when agencies do nothing, it is assumed operations will sustain their current state. But changes in the operating environment, and in particular external forces (e.g., policy changes, funding limitations, talent availability) can seriously degrade performance over time. Further, if an agency's technologies, policies, or processes lag in the current state, failing to modernize will only exacerbate the risk associated with outmoded inputs to critical workforce outputs.

As such, justification for modernization may simply be the avoidance of a loss of performance due to aging skills, processes, policies, or technologies. Such 'future proofing' activities can help agencies be responsive to emerging mission demands and adopt innovations without delays. Three significant risks are faced by agency human resource activities choosing not to modernize, increased technical debt, erosion of service quality and timeliness, and inability to fulfil mission requirements.

As with any system requiring maintenance, HRIS requires frequent updates, upgrades, and versioning to fix weaknesses, improve functionality and usability and comply with changes in standards and policies. While outdated systems may over time suffer performance limitations and reduce interoperability, the impact on system users is far more consequential. To define the **increase of technical debt**, agencies must consider the cost of retaining outmoded skillsets and expertise for one-off systems, the time demand for performing workarounds, and the risk of loss of integration or interoperability of systems impacting human resource service quality and timeliness.

More specifically, legacy technologies such as COBOL, Natural, and other aging mainframe technologies create a risk for organizations to find resources to maintain and update the HRIS assets over time. Further, and even more critically, legacy systems are subject to increased exploitation and security breach due to rapidly maturing, and increasingly sophisticated hacking and scamming agents, thus putting sensitive agency, public program, and workforce data at risk.

Beyond these system constraints and risks, outmoded HRIS inventories can further degrade an agency's ability to keep pace with talent acquisition, performance management, pay and benefits, and career development activities that are technology dependent. The **erosion of service quality and timeliness** over time, through increased errors, challenges in making record corrections, accessing, and maintaining employee records all increase scrutiny on agency human resource functions, and poses challenges to passing audits and sustaining compliance.

The impact of this potential cost is more than sustained operations and maintenance (O&M) costs, and retention of outmoded skillsets to maintain such systems, but the degraded functionality leading to decreased productivity, increased risk of security breach and compromise of protected information, as well as limitations to investments in innovation by forcing obligations. Further, agencies will face increasing challenges over time finding talent that can maintain, update, and improve the legacy systems to keep up with constantly evolving human resource demands.

Lastly, the **inability to fulfil mission requirements** poses a host of risks well beyond technical debt and service quality. Mission failure begs both executive and legislative scrutiny, may negatively impact

appropriations, and most importantly, negatively impact the quality of life of American citizens dependent upon mission delivery, particularly in the realm of public safety and health, benefits distribution, and infrastructure maintenance. Mission failure may result simply from the loss of access to top tier talent due to decaying talent acquisition technologies and lagging processes that may lead to higher structural vacancy rates and diminished talent levels whose ripple effect may be mission failure.

5 BUILDING THE BUSINESS CASE

An effective business case clearly communicates an opportunity (problem) for change (modernization), the benefit(s) expected to be achieved through the activity, alternatives considered, funds needed and an anticipated timeline for value realization and the potential for investment recovery. A good business case gives decision makers confidence that the modernization recommendation has undergone rigorous analysis and that it is the best option to overcome existing problems and realize desired outcomes.

The level of detail, complexity of analysis and even the size of the document should be proportional to the scale of the problem, the size of the modernization investment, the anticipated outputs, and outcomes to be realized, and the level of effort expected to be expended. A winning business case is clear (easily understood, logically structured), concise (to the point, factually based) and persuasive (presents a compelling argument).

The following sections represent recommended sections for inclusion in a human resources modernization business case.

5.1 Executive Summary

Provide a brief description of the current operating environment or business situation (problem) and a proposed response (modernization activity). It should include a summary table of the options (alternatives) including an initial cost estimate, potential sources of funding, and the strengths and weaknesses of each option.

ALTERNATIVES	COST	FUNDING	STRENGTH	WEAKNESS
Alternative 1: Description				
Alternative 2: Description				
Alternative 3: Description				

5.2 Business Problem

State the business case as a precise problem and offer a logical solution to resolving the problem through a modernization activity. The business problem is presented in the context of the current state of operations.

5.3 Organizational Readiness

Provide a summary of readiness assessment activities undertaken, stating what conditions in the operating environment have been met that make the agency ready to modernize. Also, identify any processes, policies or technologies that will be impacted by the modernization activity and if additional investments will be required to address these impacts.

5.4 Alternatives

Provide a detailed summary of each alternative listed in the Executive Summary, to include how the alternatives were identified, how they were evaluated, their strengths and weaknesses, and why they were ultimately not selected for recommendation.

5.5 Best Alternative

Define the best alternative from the previous section. This alternative is the modernization activity for which the business case is being developed and provides a detailed summary of how the alternative was evaluated, its strengths and weaknesses, the outcomes it is expected to achieve, and why it was ultimately selected for recommendation.

5.6 Pilot / Proof of Concept / Prototype

If the modernization activity is being presented as a pilot, proof of concept or prototype, provide details related to how a successful effort will be scaled to the enterprise.

5.7 Expected Outcomes

Include a narrative description of the outcomes selected and optionally, a table of outcomes. Contextualize the outcomes to the agency’s specific problem, and align the outcomes to agency business strategies, human capital operating plans (HCOP), and DEIA Strategic Plans. Also, consider presenting ‘ranges of success’ or ‘confidence levels’ for each of the output and outcome measures.

5.7.1 Outcomes

Identify outcomes related to improved human resource productivity, such as decreased processing times and life cycle durations, reduced errors in processing, reduced incidences of exposed Personally Identifiable Information (PII), reduced, or eliminated instances of pay errors, reduced necessity to perform corrections, etc.

5.7.2 Outputs

Identify outcomes related to changes in the operating environment, such as increased time during normal working hours to accommodate professional development activities, improved customer satisfaction through reduced errors, availability of necessary talent to perform mission activities, etc.

OUTCOME	CONTEXT	BENEFIT	OUTPUTS MEASURES	OUTCOME MEASURES
Outcome 1: Description				
Outcome 2: Description				
Outcome 3: Description				

5.8 Investment and Recovery

Identify the total investment to be made in the modernization activity, define the return on investment and state the timeline and method for recovering the investment funds, if any.

5.8.1 Funding Source

Identify the source of funding to be used to support the modernization activity. If there are multiple sources of potential funding, identify each and provide a level of confidence in obtaining each.

5.8.2 Functional Cost

Calculate the functional cost as a comparison of the current operating cost, the anticipated post implementation operating cost (immediate) and the future operating cost. A portion of the return on investment (ROI) may be defined as the difference between the current and future operating costs, minus the implementation costs.

5.8.3 Hidden Cost

Identify any hidden costs, or those realized by not modernizing (e.g., not getting the A candidate, candidates lost after selection, etc.).

5.8.4 Anticipated Return

Identify the timeline for when the modernization activity is expected to realize its ROI, in terms of both cost avoidance and cost savings.

5.8.5 Financial Model

Include the financial model as a spreadsheet that incorporates the funding source, functional cost, hidden cost, and anticipated return.

5.9 Change Management

Define the strategy for managing change associated with modernization activity.

5.10 Implementation Plan

Provide a summary of activities, timelines, schedules, milestones, stakeholders, etc., associated with implementing the modernization recommendation.

5.11 Governance and Accountability

Define the governance structure of the modernization project as well as post implementation accountability. These can be new temporary or permanent structures to be put in place for oversight, or leveraging existing structures which will receive status updates and have the final say in whether the modernization activity was successful or not.

5.12 Reporting Results

Define how and how frequently the status of the modernization activity will be tracked, monitored, and reported on, and how the results will be captured and reported to stakeholders. Also, consider how unintended consequences (both positive and negative) will be addressed and reported on.

5.13 Future Steps

Identify future steps that may need to be taken to reinforce or sustain the change achieved through the modernization activity. Examples include:

- Adopting a continual improvement culture to create expectations that when the modernization is complete the agency sustains the change effort and takes on the next 'increment' of modernization.
- Establishing an innovation cell within the modernization program to mature the modernization process with each subsequent activity.

Appendix A – Outcome and Output Matrix

BENEFIT	OUTPUT (Production Improvement)	OUTCOME (Condition Change)
Increased Speed to Hire	<ol style="list-style-type: none"> 1. Reduced total time (e.g., days elapsed, hours preparing hiring package) spent recruiting and selecting new employees (lifecycle: from job requisition to onboarding). 2. Reduced total time to select and onboard new employees (segment: from receipt of certificate of eligibles by the customer to selection and onboarding). 	<ol style="list-style-type: none"> 1. Sufficient staffing to conduct routine business operations and perform mission activities. 2. Ability to acquire sufficient and appropriate talent to perform mission activities.
Increased Process Integration, Quality and Timeliness	<ol style="list-style-type: none"> 1. Reduced error rates requiring rework. 2. Reduced corrective actions after processing. 3. Reduced time to complete actions. 4. Reduced staff necessary to perform transactional work. 	<ol style="list-style-type: none"> 1. Increased process efficiency (reduction in adoption time, increased system proficiency, etc.). 2. Improved user experience, attrition rates, employ/0ee satisfaction, and process cycle times. 3. Reduced systems in HRIS technology inventory and (potential for) decreased operations and maintenance costs.
Increased Policy Compliance	<ol style="list-style-type: none"> 1. Elimination of non-compliant hiring actions. 2. Reduction of human resource, equal opportunity, etc., complaints resulting from policy non-compliance. 3. Accomplishment of Diversity, Equity, Inclusion and Accessibility (DEIA) goals. 4. Reduction of sensitive data breaches or exposures. 	<ol style="list-style-type: none"> 1. Increased policy responsiveness (reduced time lag between policy mandate and demonstratable agency compliance). 2. Reduction in human resource, financial and technology audit findings. 3. Retention of hiring authorities, funding authorities, and authorities to operate technology.
Improved Customer and Employee Experience	<ol style="list-style-type: none"> 1. Increased production (providing more services to more customers in the same or less time). 2. Increased quality (less errors, rework, or corrections). 3. Reduced status queries or complaints (workforce, customer). 	<ol style="list-style-type: none"> 1. Increased satisfaction (demonstrated through employee and customer surveys). 2. Decreased absenteeism (employees needing mental health days). 3. Increased retention (of both employees and customers). 4. Increased mission and operational impact (demonstrated through customer desk audits).
Improved Workforce Intelligence Sharing	<ol style="list-style-type: none"> 1. Adoption of common (governmentwide) human resource standards. 2. Data-evidenced decision making to improve human resource operations. 3. Improved alignment of employees performing human resources work and enhanced workload management. 4. Increased confidence in governmentwide workforce data and human resource trends. 	<ol style="list-style-type: none"> 1. Acquiring 'future-fit' workforces able to meet anticipated demands without significant retraining or development. 2. Shared investment in future talent development (e.g., school programs, internships).
Increased HRIS and Network Security (Cybersecurity)	<ol style="list-style-type: none"> 1. Compliance with governmentwide cybersecurity mandates and protocols. 2. Reduction in employee data loss through outdated, interoperable systems. 3. Reduction in employee data spillage. 4. Reduction in employee data incursion through breach. 	<ol style="list-style-type: none"> 1. Increased employee trust in agency (through positive perception of safe working environment). 2. Future ability to integrate modernized systems and networks due to uniform security postures.

Appendix B - References

TITLE	PUBLISHER	DATE
Capital Programming Guide	Office of Management and Budget	2021
Human Capital Operating Plan Guidance	Office of Personnel Management	2021
President's Management Agenda	White House	2022
Human Capital Business Reference Model	Office of Personnel Management	
M3 Playbook	Office of Shared Solutions and Performance Improvement	2019
Measuring the Business Value of Shared Services	Center for Organizational Excellence/ Shared Services Leadership Coalition	2023
New Opportunities to Achieve through Public Private Partnerships	Center for Organizational Excellence	2022
Steps Toward an Enhanced Shared Services Strategy	IBM Center for the Business of Government	2023
Transforming the Governance of Federal Human Capital Management	Center for Organizational Excellence	2020



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