Telework

Achieving Higher Levels of Federal Employee Productivity, Inclusion, and Environmental Sustainability

Authors
Albert Cho
Alan Balutis

May 2011

Cisco Internet Business Solutions Group (IBSG)

Telework

Achieving Higher Levels of Federal Employee Productivity, Inclusion, and Environmental Sustainability

The U.S. Telework Enhancement Act of 2010 generated tremendous momentum toward increasing workforce mobility options for federal employees. The Act paves the way for the federal government to unlock significant benefits, including greater productivity, resilience, environmental sustainability, and employee inclusion. It creates accountability for achieving these objectives in the form of Telework Managing Officers (TMOs), senior officials responsible for telework policy development and implementation.

Realizing these objectives will require a significant departure from current practice. To date, agencies have focused on increasing telework participation rates through advertising, employee training, and resolution of technological barriers. Meaningful progress toward the Act's other goals—including emergency readiness, energy use, recruitment and retention, performance, and productivity—will require moving past first-generation strategies aimed at increasing telework participation rates and, instead, pursuing integrated mobility strategies explicitly linked to agency business objectives.

TMOs should not view the Act as just another administrative burden that requires compliance. As the first TMOs assume their roles, they have a unique opportunity to use workforce mobility—including telework and a broader range of tools and systems to enable productivity anywhere, anytime, and on any device—as a catalyst to create a more flexible, productive, and inspiring federal workplace. Achieving this vision requires a sober assessment of the current situation, an ambitious, goal-driven strategy linked to agency business objectives, and a new management posture aimed at transforming mind-sets and behaviors rather than resolving technological challenges. In this paper, the Cisco® Internet Business Solutions Group (IBSG) offers initial perspectives on each of these issues.

Mobility in the Federal Workforce: A Work in Progress

The most comprehensive fact base on mobility in the federal workforce comes from the U.S. Office of Personnel Management (OPM), which collects agency data used to prepare annual reports to Congress. These data have limitations: the most recent are from 2009 and suffer from quality challenges described in OPM's most recent report. We believe inferences based on these data must be treated with caution and some skepticism. Nevertheless, OPM data provide the official multiyear fact base for understanding the state and trends of telework in the federal government, and highlighting these inferences will help agencies understand the importance of consistent reporting over time. As reported, the data suggest that despite progress, telework in the federal government remains a work in progress:

- **Rising participation: good news / bad news.** While overall federal telework participation has increased markedly in recent years, it is still below 2005 levels, and ineligibility for telework has increased each year since 2005.

- **Agency telework adoption varies widely.** This is true even accounting for agency-specific differences in eligibility of roles.

- **Organizational and cultural issues are the key barriers** to broader workforce mobility in the federal government, not technological or financing issues.

Rising Participation / Declining Eligibility

The 2010 Status of Telework Report to Congress cites a "general, albeit small, increase in participation across federal telework programs." Table 1, excerpted directly from this report, demonstrates increases in telework participation across the federal government.

Table 1.   Telework Participation Highlights.

	Calendar Year 2008	Calendar Year 2009	Increase
Number of teleworkers	102,900	113,946	11,046
Percentage of federal employees teleworking	5.24%	5.72%	Less than .5%
Percentage of telework-eligible employees actually teleworking	8.67%	10.40%	1.73%

Source: U.S. Office of Personnel Management, 2010

Closer analysis reveals a more complicated story. We disaggregated these data and placed them in a time series using OPM data from 2005 to the present. Two important messages emerge from these data. First, while telework has increased in recent years, it is recovering from a multiyear decline and remains below levels reached in 2005. Second, while the percentage of eligible employees actually telework is growing, this is due mostly to a sharp decline in the number of telework-eligible employees—a trend that is not readily apparent in the OPM report to Congress (see Figure 1).

Declining eligibility could be an artifact of data quality issues or a reflection of changing eligibility criteria in agencies over time. Perhaps a more systematic review of roles and responsibilities has led to a realization that previously eligible employees cannot telework effectively or that certain roles are not appropriate for remote access. But given significant improvements in technology and practice, the political momentum behind telework, and growing telework penetration rates in the private sector, declining eligibility seems suprising and deserves greater scrutiny at the agency and subagency levels.

Figure 1.   Telework Is Increasing, but Elegibility Has Dropped Precipitously.
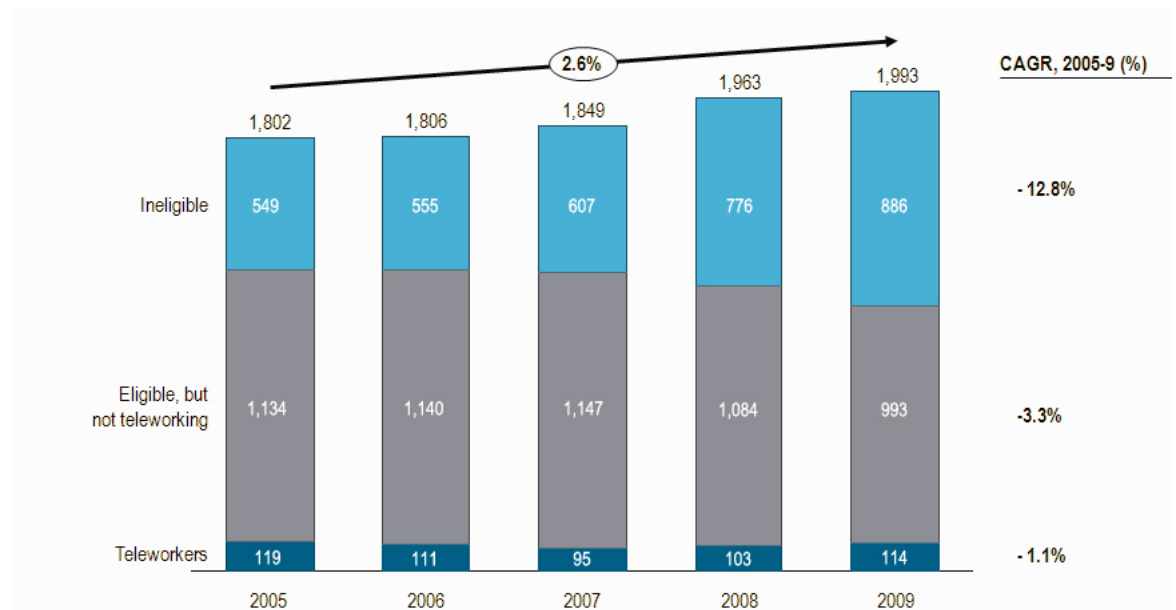
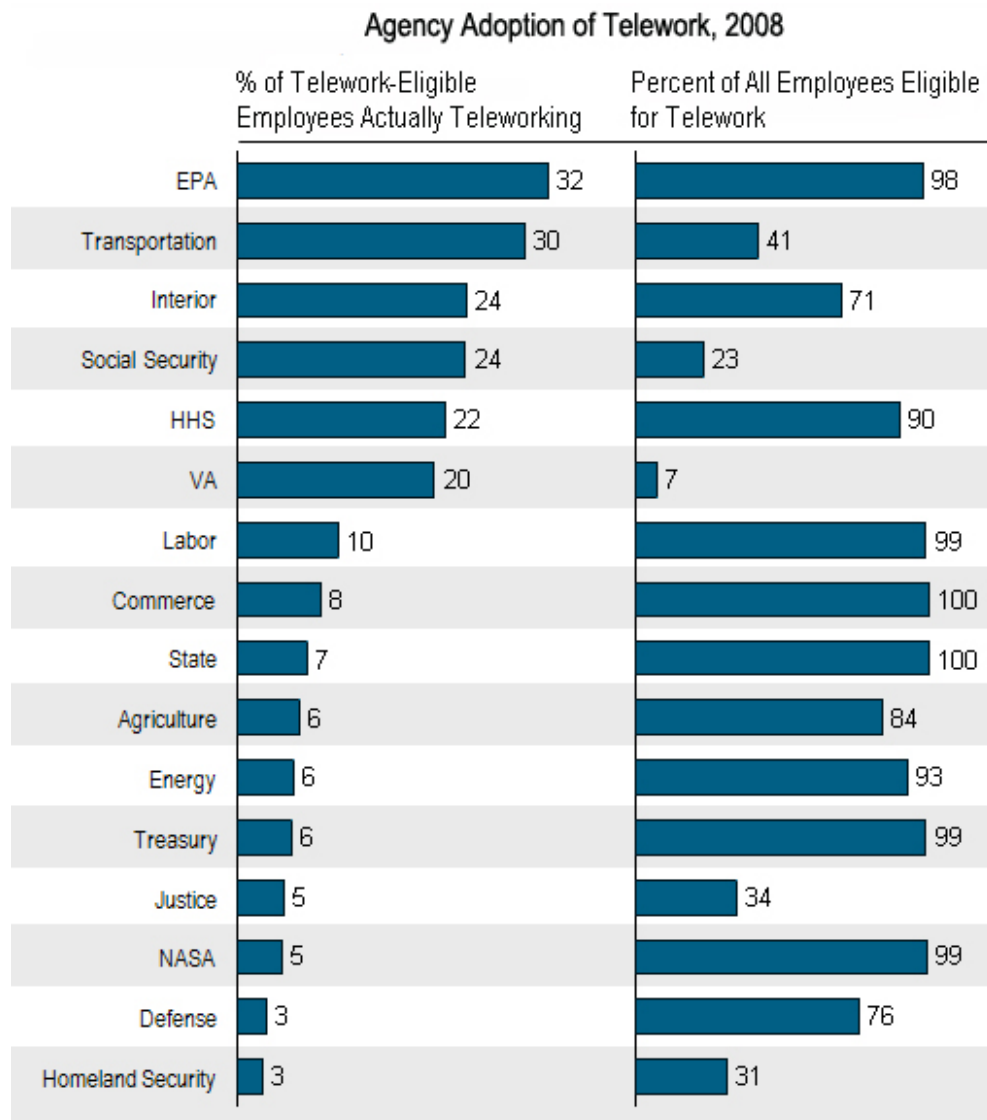Sources: U.S. Office of Personnel Management, 2010; Cisco IBSG, 2011

Agency Adoption Varies

Cisco IBSG's analysis further underscores wide variance in telework adoption across agencies. Figures 2, 3, and 4 illustrate some of the most significant differences among agencies (using 2008 data from last year's report due to data gaps at the agency level in this year's report). They show substantial variations among agencies in eligibility, participation, and frequency of telework activity:
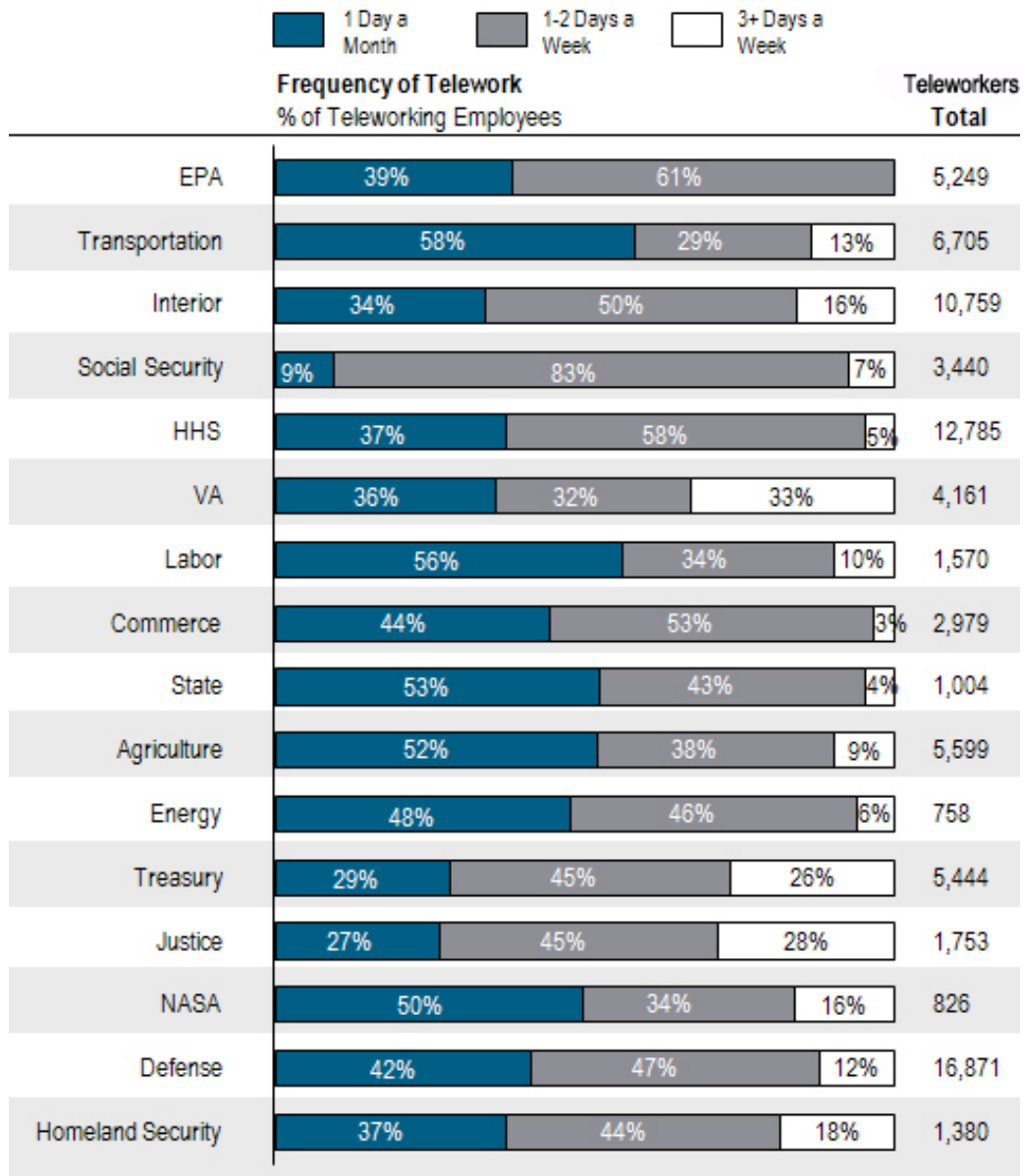
- **Eligibility.** OPM statistics suggest that in eight of the 16 agencies with more than 10,000 employees in 2008, more than 90 percent of employees were eligible for telework. In five other agencies, however, less than 50 percent of workers were eligible for telework. Eligibility differences are partly due to varying agency missions, but likely also reflect dissimilarities in management attitudes toward roles.

- **Participation.** No large agency reported more than one-third of eligible employees actually adopting telework arrangements. Several environmental and social services agencies (Environmental Protection Agency, Transportation, Interior, Social Security, Health & Human Services, and Veterans Administration) achieved adoption rates of more than 20 percent, but in the rest of the larger agencies, 10 percent or less of eligible employees exercised telework options.

- **Frequency.** Disaggregation of the number of teleworkers by telework frequency shows wide variation among agencies. In most agencies, the majority of teleworkers worked remotely just once a month, but some agencies such as the Social Security Administration, Treasury, and Justice had significantly higher rates of frequent and regular teleworkers.

Some of this variation is natural and mission-driven, given the broad range of different functions and responsibilities agency employees fulfill. However, the substantial variation in participation rates also suggests that cultural and organizational factors have played a major role.

Figure 2. Agencies Vary Significantly in Employee Telework Eligibility.

Agency Adoption of Telework, 2008

Agency	% of Telework-Eligible Employees Actually Teleworking	Percent of All Employees Eligible for Telework
EPA	32	98
Transportation	30	41
Interior	24	71
Social Security	24	23
HHS	22	90
VA	20	7
Labor	10	99
Commerce	8	100
State	7	100
Agriculture	6	84
Energy	6	93
Treasury	6	99
Justice	5	34
NASA	5	99
Defense	3	76
Homeland Security	3	31

Sources: U.S. Office of Personnel Management, 2010; Cisco IBSG, 2011

Figure 3. Frequency of Telework Among Employees of Federal Agencies Is Surprisingly Low.

	1 Day a Month	1-2 Days a Week	3+ Days a Week		Teleworkers Total
	Frequency of Telework % of Teleworking Employees				
EPA	39%	61%			5,249
Transportation	58%	29%	13%		6,705
Interior	34%	50%	16%		10,759
Social Security	9%	83%	7%		3,440
HHS	37%	58%	5%		12,785
VA	36%	32%	33%		4,161
Labor	56%	34%	10%		1,570
Commerce	44%	53%	3%		2,979
State	53%	43%	4%		1,004
Agriculture	52%	38%	9%		5,599
Energy	48%	46%	6%		758
Treasury	29%	45%	26%		5,444
Justice	27%	45%	28%		1,753
NASA	50%	34%	16%		826
Defense	42%	47%	12%		16,871
Homeland Security	37%	44%	18%		1,380

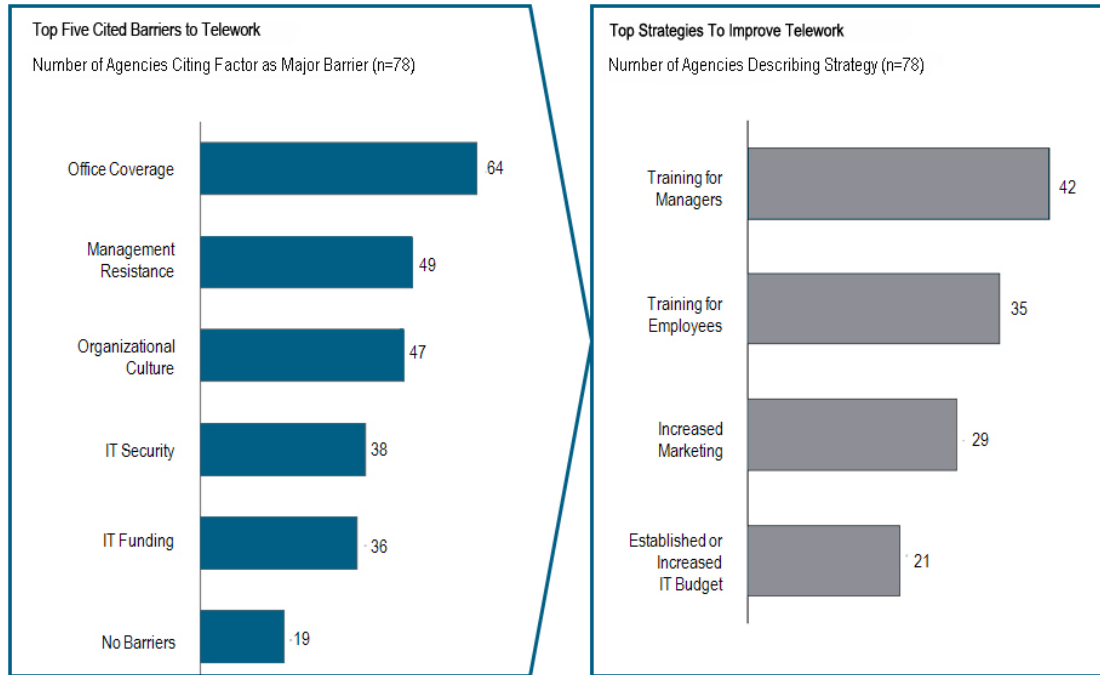Sources: U.S. Office of Personnel Management, 2010; Cisco IBSG, 2011

To the extent these data accurately reflect underlying practice, they suggest the existence of widely different "segments" or "profiles" of teleworkers. In many agencies, the majority of teleworkers work remotely just once a month. In others, the majority do so on a weekly basis. These employee segments are likely to have different interests, objectives, and mobility requirements, suggesting the need for mobility programs that address the range of different telework use cases and profiles in a given agency.

Organizational and Cultural Issues

OPM data also suggest that the most significant barriers to telework are organizational and cultural rather than technological or financial. As Figure 4 shows, the three most significant barriers identified by OPM respondents were the need for office coverage, management

resistance to telework, and organizational culture. Technology-related challenges, such as IT security and IT funding, lagged far behind. The relatively slow adoption of telework and the consequent failure to realize the benefits of mobility are issues of organization and personnel management, not of technological maturity.

Figure 4. Agency Organizational and Cultural Issues Are the Most Significant Barriers to Telework; Promotional Strategies Have Focused on Training and Marketing.

Sources: U.S. Office of Personnel Management, 2000 and 2010; Cisco IBSG, 2011

Office culture cannot be altered with the stroke of a pen; it will take time and effort to develop new coverage models, address concerns about performance evaluation and recognition for remote workers, and help managers understand the trade-offs involved in expanding telework options for their employees. Solutions currently being implemented by agencies—such as training for managers and employees, and increased marketing—can only incrementally increase telework participation unless managers and employers are trained to think differently about roles, relationships, and performance.

Shifting Focus to Business Objectives

The U.S. Telework Enhancement Act of 2010 asks agencies to report not only changes in telework participation rates, but also the contribution telework is making toward key business objectives—in particular, "emergency readiness, energy use, recruitment and retention, performance, and productivity."

To realize these potential benefits of workforce mobility, agencies need to move from first-generation strategies focused on increasing telework participation rates to more comprehensive approaches directly linked to agency business objectives. The rationale for integrating mobility plans into agency strategy rather than treating them independently is that agencies have multiple business objectives, which in turn require different approaches to

mobility. Ensuring continuity of operations, for example, may require a set of mobility tools that is different from what's needed to increase inclusion and diversity in the workforce.

For TMOs and agency leadership, the key message is that mobility planning must evolve to become a strategic element rather than an independent process focused on increasing telework participation. A brief examination of several business objectives makes the importance of integrated planning clear:

- **Productivity, satisfaction, retention.** Perhaps the most obvious rationale for an aggressive telework strategy is to increase employee productivity, happiness, and retention. The OPM survey demonstrates that teleworking employees are clearer about work expectations, have higher job satisfaction, and are less likely to express an intention to leave than respondents unable to telework. Cisco IBSG research also suggests that for every 60 minutes employees save on commuting, they work an extra 40 minutes. First-generation strategies work well here; by making more employees eligible, advertising telework, training employees, and removing technical obstacles, agencies can unlock significant gains in employee performance even if telework is casual, infrequent, and irregular.

- **Inclusion and diversity.** Providing flexible work options, including the ability to work remotely, can support agency objectives related to diversity and inclusion. Cisco research has established that mobility tools can help older employees stay engaged in the workforce—an important consideration, given that nearly 25 percent of the federal workforce is near retirement age.[1] Flexibility is also important for other demographic groups, including the disabled and working parents of both genders. Achieving inclusion and diversity objectives with mobility tools requires investment in careful program planning, design, and implementation to ensure that agency efforts adequately target and meet the needs of relevant populations. The telework profile of target employees might involve more frequent and regular telework, more intensive technology needs to support persistent access, and richer (potentially video-enabled) collaboration tools to permit more robust communication and connection with peers.

- **Continuity of operations (COOP).** Federal agencies already recognize the importance of incorporating mobility into COOP planning: OPM data suggest that 72 percent of agencies already incorporate telework into their COOP plans. However, a mobility strategy for COOP will look different from a traditional telework promotion plan. It will require identifying critical functions, training selected employees, running scenario exercises, and investing in resilient infrastructure, such as virtualized desktops that can run securely on any device to ensure continuity in crisis scenarios. In some cases, resilience planning might not require accommodation for frequent, casual telework at all, instead creating a persistent, "always on" technological capability to deliver highly secure remote access only when required to support continuity of operations.

- **Energy use / sustainability.** Telework can help lessen energy consumption in at least two ways: by reducing the amount of transportation required, and by decreasing space and utility requirements at the office. A mobility strategy that increases the frequency and regularity of telework can enable office reconfigurations to reduce the amount of square footage per employee, decreasing (and potentially eliminating) office space and, in turn, saving real estate costs, energy, and greenhouse gas emissions. Agencies have already

experienced successes in meeting this objective; an oft-cited statistic is that the U.S. Patent and Trademark Office has saved US$11 million in office leasing costs by aggressively promoting telework.[2] Since transportation emissions decrease as telework increases, this business objective might require accommodation only for casual, infrequent telework. But realizing sustainability gains from downsizing real estate footprints would require shifting a meaningful population of employees to regular, ongoing telework, necessitating an appropriate technological and policy infrastructure.

These examples demonstrate the degree to which complementary but separate policy objectives generate different technological and policy requirements that might not be addressed by a focus on increasing casual telework participation rates. A policy of encouraging telework across agencies is a "no-regrets" move, but it is insufficient to achieve significant progress toward the business objectives outlined in the Telework Enhancement Act. To unlock the true benefits of workforce mobility, TMOs and agency leads must embed mobility within the broader context of agency strategic planning, not treat it as a separate management silo.

Implications for TMOs and Agency Leads

In recent years, federal agencies have made tremendous progress in reversing a sustained decline in telework participation. The objective of creating a more productive, inclusive, sustainable, and resilient federal workforce remains a work in progress. The Telework Enhancement Act has dramatically improved the odds of success by creating TMOs responsible for telework policy development and implementation in every agency.

The first cadre of TMOs faces an exciting—and daunting—opportunity to create lasting impact in their agencies. They should interpret their roles broadly, to include not only the promotion of traditional telework arrangements, but also the development of mobility strategies that contribute meaningfully to agency business objectives such as productivity, inclusion, resilience, and sustainability. They should additionally address the diverse mobility objectives of different segments of the employee population. Doing so will require engaging agency leadership on a range of different topics to develop an integrated plan:

Develop the fact base. How does telework participation in this agency compare with participation rates in comparable organizations in the public and private sectors? Which role categories or subagencies have the highest and lowest telework rates relative to eligibility? What are the key market segments and use cases within the employee base, and how intensively do they hope to use mobility options?

Articulate ambitious business goals. What are the agency's goals related to productivity, inclusion, resilience, and sustainability (and any others relevant to the organization)? How can mobility enable achievement of these goals, and how can progress be measured?

Identify a portfolio of approaches. Identify a range of initiatives to implement and monitor over the next one to three years. These might include:

- Activities designed to increase general participation in telework (e.g., increased marketing and manager training, and standardization of policies and tools)
- Activities designed to serve specific mobility-related business objectives (e.g., identifying strategies to keep older employees engaged by implementing mobility-enabling infrastructure solutions)

- Ambitious, transformational pilots that are high-risk but potentially high-reward (e.g., alternative financing models for employee telework equipment; transitioning an entire subagency or office, such as finance or legal, to flexible work options)

Tailor these approaches to different user profiles. Develop a limited set of easy-to-understand "packages" for teleworkers based on different anticipated levels of frequency and intensity, with tailored agreements, infrastructure recommendations, and best practices for each segment

The Telework Enhancement Act provides the federal government with an exciting opportunity to reshape the workplace around mobile norms and practices. Successful implementation will enable the federal government to make substantial progress toward its business objectives and become more productive, inclusive, resilient, and sustainable.

For more information on the mobile federal workforce, please contact:

Alan Balutis, Public Service Practice
Cisco Internet Business Solutions Group
Phone: +1 202 354 2946
Email: abalutis@cisco.com

Albert Cho, Director, Public Service Practice
Cisco Internet Business Solutions Group
Phone: +202 354 2937
Email: albcho@cisco.com

Acknowledgements

Endnotes

- U.S. Office of Personnel Management, FedScope,
  http://www.fedscope.opm.gov/intro/start.asp

- U.S. Patent and Trademark Office,
  http://www.uspto.gov/about/offices/cao/TeleworkAnnual09FINAL_Section_508.pdf

More Information

Cisco Internet Business Solutions Group (IBSG), the company's global consultancy, helps CXOs from the world's largest public and private organizations solve critical business challenges. By connecting strategy, process, and technology, Cisco IBSG industry experts enable customers to turn visionary ideas into value.

For further information about IBSG, visit http://www.cisco.com/go/ibsg.