AI/GenAI and the Future of Work In Public Service

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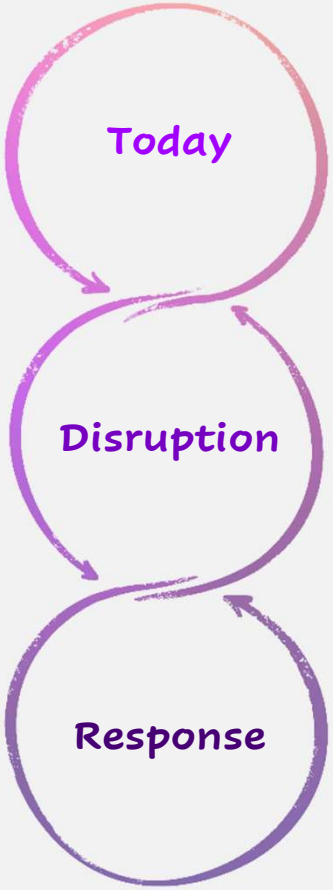
AI and the Future Work



Reimagining Public Service

Redefining Work in the Age of AI

Building Resilient Workforces

AI and the Future Work

Today

Reimagining Public Service

Disruption

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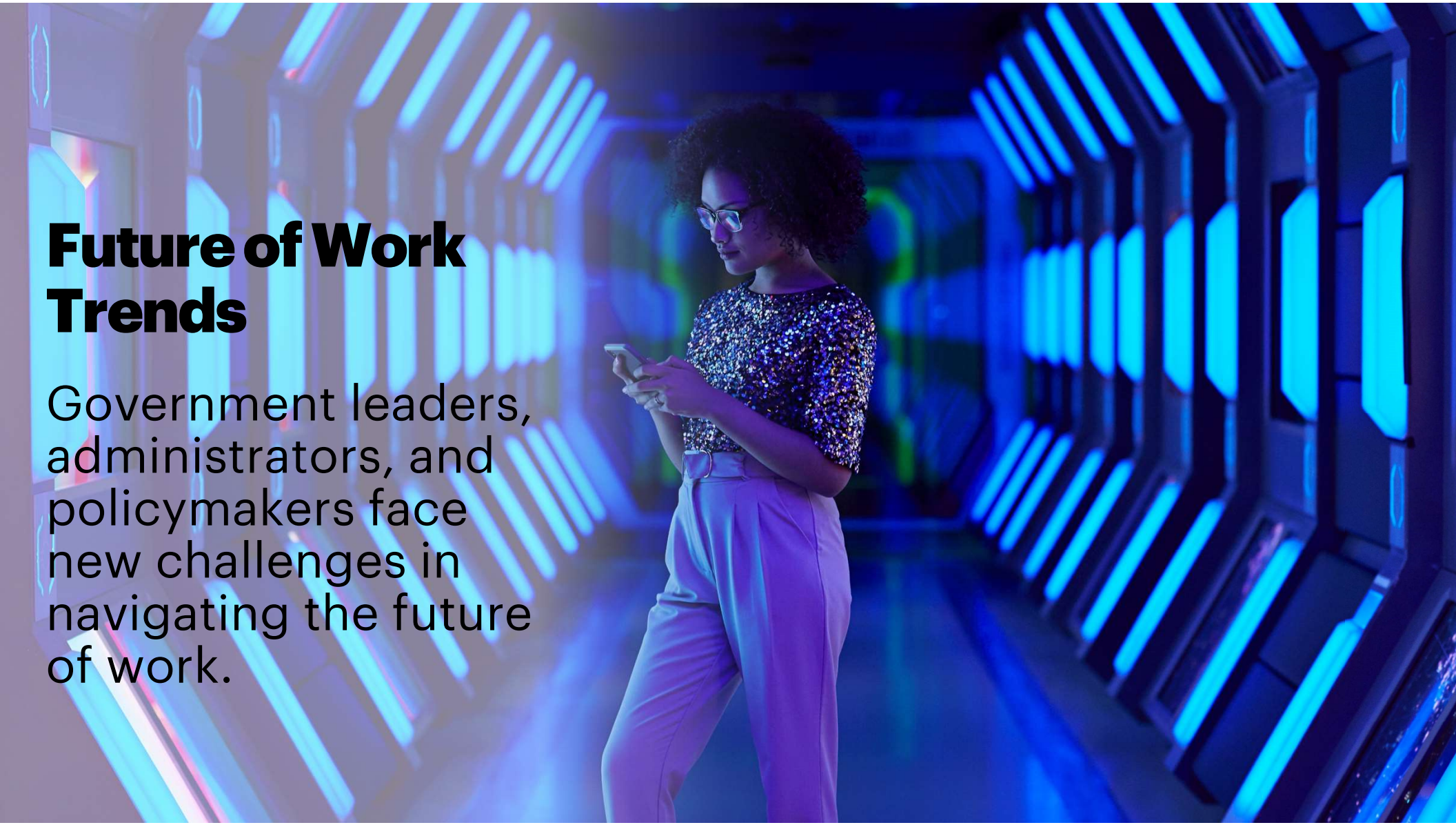
Response

Building Resilient Workforces



Future of Work Trends

Government leaders, administrators, and policymakers face new challenges in navigating the future of work.

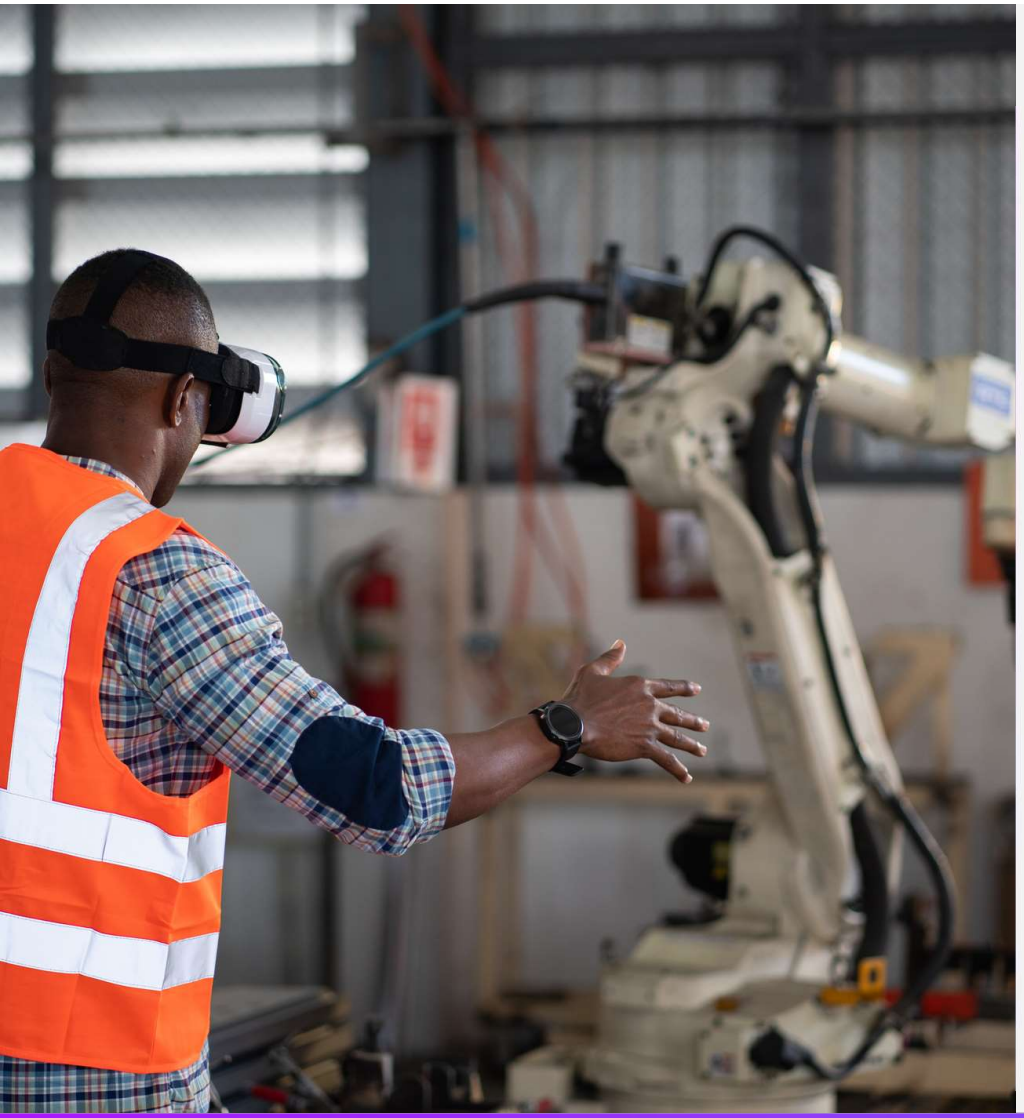
AI impacts and creates opportunity for the workforce

Individual change: Free up employees from automatable, routine tasks, and redirect energy and focus to more strategic creative work that requires human intuition, decision-making and problem-solving skills

Organizational change: Changes to organization structure, roles, processes and capabilities over time to account for the implications of Gen AI

Labor market change: AI models will become an ever-present co-pilot for every worker, and the change to jobs will result in shifts in the labor workforce makeup. Knowledge workers will be the most impacted

Societal change: As the nature of work and the labor market changes, we will see a once-in-a-generation shift in what is considered “work”



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Generative AI is a step change in the evolution of AI.

Machine Learning: Analysis and Prediction Phase

Deep Learning: Vision and Speech Phase

Generative AI: Language-Mastery Phase

Open Gen AI vs. Closed Gen AI

Open GenAI uses publicly available and potentially copyrighted information.
Can return inaccurate information as a result.

VS

Closed GenAI uses information that from closed sources so information is accurate and secure.

Source: Accenture | A new era of generative AI for everyone

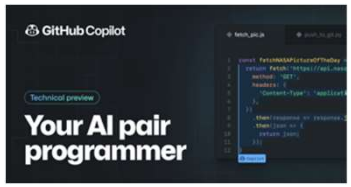
Generative AI is pushing creative expression forward by giving people tools to create content and can optimize organizations

Code

For developers who enabled it, 40% of their code is written by CoPilot, GitHub's AI assistant. This will make the creative use of code more accessible to non-developers

Text

The most advanced domain, which has already passed Medical, Law, and Business exams. As models improve, we will see higher-quality outputs and longer-form content.



Video

The Crow, an AI movie, won the 2022 Cannes festival in the category of short films

Images

This is one of the most famous applications as the images AI can create are incredible and even won the top prize in a painting competition

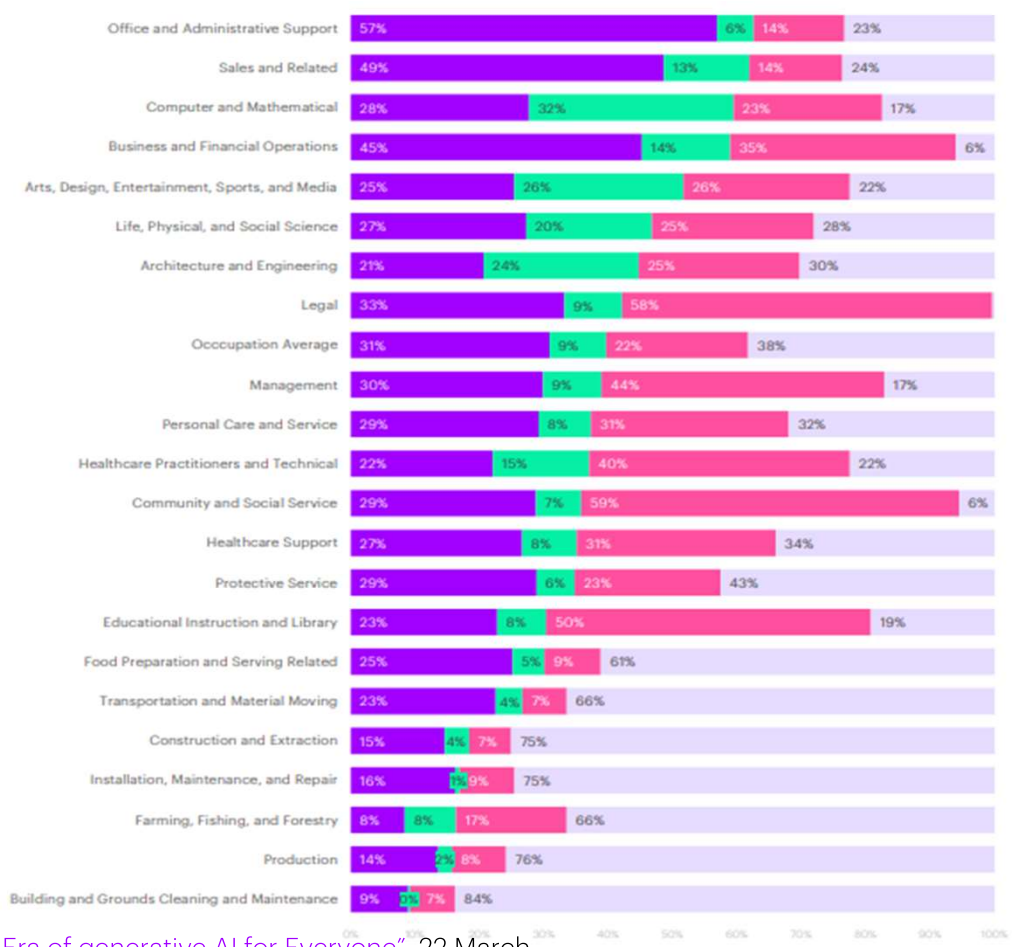
Speech synthesis and translation

Whisper understands speech better than humans, even with background noise, and can translate between virtually any language.

Generative AI Will transform work across every job category

Take a people-first approach

Success with generative AI requires an equal attention on people and training as it does on technology. Companies should therefore dramatically ramp up investment in talent to address two distinct challenges: creating AI and using AI. This means both building talent in technical competencies like AI engineering and enterprise architecture and training people across the organization to work effectively with AI-infused processes. In our analysis across 22 job categories, for example, we found that LLMs will impact every category, ranging from 9% of a workday at the low end to 63% at the high end. More than half of working hours in 5 of the 22 occupations can be transformed by LLMs.



Work time distribution by major occupation and potential AI impact

Based on their employment levels in the US in 2021

In 5 out of 22 occupation groups, Generative AI can affect more than half of all hours worked

Source: Accenture Research based on analysis of Occupational Information Network (O*NET), US Dept. of Labor; US Bureau of Labor Statistics.

Notes: We manually identified 200 tasks related to language (out of 332 included in BLS), which were linked to industries using their share in each occupation and the occupations' employment level in each job category. Tasks with higher potential for automation can be transformed by LLMs with reduced involvement from a human worker. Tasks with higher potential for augmentation are those in which LLMs would need more involvement from human workers.

Source: Accenture research "A new Era of generative AI for Everyone", 22 March

Generative AI Disruption Index

Public Service/Higher Education/Government – Level 0 + 1

Integrated Eligibility

- Public Outreach/Digital Interactions
- Contact Center
- Eligibility/Case Management
- Benefit Distribution
- Forms and Notices
- Back Office
- Reporting/Analytics
- Licensing

Child Welfare

- Identifying Protective Factors
- Interpreting history
- Access to Policy/Practice

Child Support

- Custodial Parents
- Non-Custodial Parents
- Employers

Parks, Recreation and Culture

- Citizen Engagement / Contact Center
- Facilitates Management
- Grants Management

Tax and Revenue

- Customer Interaction
- Return Processing
- Collection
- Audit / Case Management
- Tax Agents / Advisors

Post and Parcel

- Customer Engagement
- Sales Support
- Postal Operations
- Back Office

Workforce Development

- Contact Center
- Unemployment Insurance/ benefits administration
- Job placement and career services
- Training and skill development
- Labor market information and analysis
- Employer Engagement and Business Services

Transportation & Infrastructure

- Transportation
- Infrastructure

Borders

- Customs and International Trade
- Immigration, Asylum, Citizenship
- Biometrics and Digital Identity at the border
- Ports Transformation

Public Safety

- Police and Law Enforcement
- Fire and Emergency Management
- Courts ad Justice
- Prisons / Correction
- Probation

Pensions

- Pension Member Engagement/Contact Center
- Benefit Administration
- Investment/Fund Management

Public Health

- Experience/ Engagement
- Enterprise System Transformation
- Back Office
- Middle Office
- Security

Defense

- Force Management
- Force Development
- Force Generation
- Force Employment
- Force Support

General Services / Administration & Budget

- HCM
- Procurement
- CIO / Technology
- Finance
- Payroll
- Case/Service Management

Nonprofit

- Fundraising
- Grants Management
- Enterprise Functions
- Program Delivery

Education

- Student Experience
- Growth Strategy
- Learning Experience
- Operation Optimization
- Security and Data Management

Agriculture

- Citizen Engagement / Contact Center
- Benefit / Payment Administration
- Land Management

Elections

- Elections Management
- Election Security
- Registration / Citizen Engagement

Business and Economic Development / Commerce

- Small Business Affairs
- Industry Affairs
- Disaster Recovery & Resilience

Consumer and Housing

- Community Planning and Development
- Citizen Engagement / Contact Center
- Housing

Environment and Natural Resources

- Forestry
- Water Management
- Mining, Oil, and Gas
- Citizen Engagement / Contact Center

Disruption Index: High | Medium | Low

State Government Generative AI Disruption

From largest State Employers to the Smallest

K-12 Education
- Personalized Learning
- Automated Feedback
- Disability Support
- School Administration

Higher Education
- Advanced Research
- Curriculum Development
- Interactive Case Learning
- Early Drop Out Detection

Public Safety
- Police and Law Enforcement
- Courts ad Justice
- Recidivism Predictions
- Resource Allocation. Patrol Route Mapping.
- Case Management
- Facial Recognition

Integrated Eligibility
- Contact Center
- Eligibility/ Case Management
- Forms and Notices
- Back Office
- Reporting/Analytics
- Licensing

Child Welfare
- Identifying Protective Factors

Child Support
- Custodial Parents

Transportation
- Long Range Planning
- Predictive Maintenance
- Traffic Flow Optimization
- Gas Tax EV Fare Adjustments
- Integrated Traffic Signal

Parks, Recreation and Culture
- Facilitates Management
- Grants Management

Environment and Natural Resources
- Forestry
- Water Management
- Citizen Engagement / Contact Center

Agriculture
- Citizen Engagement / Contact Center
- Benefit / Payment Administration

Workforce Development
- Unemployment Insurance/ benefits administration
- Job placement and career services
- Labor market information and analysis
- Employer Engagement and Business Services

Administration
- Procurement
- Payroll
- Preventative Maintenance
- Fleet Optimization
- Recruitment
- Budget, Revenue, Tax

> Largest Impact

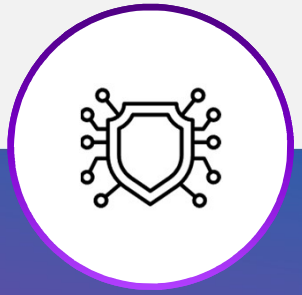
Generative AI introduces some unique risks and challenges

Workforce Displacement

- Gen AI's impact viewed as more possible and direct for roles that were initially viewed as outside of AI's immediate reach (creatives, lawyers, etc.)

Unreliable Outputs

- Hallucinations
- Explainability and traceability
- Quality, accuracy, interpretability
- Relevancy / consistency
- Disclosure & transparency



Confidentiality & Security

- Unauthorized disclosure of confidential information
- Security vulnerabilities

Liability & Compliance

- Copyright, IP, and content ownership
- Regulatory compliance
- Contractual liability
- Product liability
- Consumer protection concerns

Bias and Harm

- Representational harm
- Misinformation
- Toxicity
- Fraudulent attacks
- Disinformation spread
- Harmful content generation at scale

Responsible AI Framework Augmentations for Generative AI

Principles & Governance

Uplift Responsible AI **Principles, Policy, Standards** and **governance** to **account for risks amplified by generative AI** and its democratized usage.

Establish **clear roles and responsibilities** and ensure and end-to-end framework for oversight and compliance.

Implement mechanisms for **accountability and transparency** and establish defined access and authorization protocols to **safeguard sensitive information**.

Risks, Policy, & Control

Adapt **current risk assessment, controls, & reporting/escalation paths** to incorporate new questions specific to risks posed by generative AI systems, including **human-in-the-loop reviews**.

Ensure Legal agrees **terms of use for foundation models and managed services**.

Consider **firmwide restrictions** on submitting confidential, proprietary, or personal data / information.

Technology Enablers

Ensure **transparency** for end users of the applications.

Apply **bias** and **data quality** checks to fine tune data and **mitigate hallucinations**.

Embed technical approaches for **accuracy, robustness, safety** and **explainability** **into prompts and fine tuning**.

Set up a **monitoring system** to review AI outputs & corresponding inputs. Check for **identifiable infringement** (eg, brands, personal data) or **problematic content** (e.g., offensive statements).

Culture & Training

Provide **firmwide guidance** and **training** on appropriate usage and risks of generative AI, and on **avoiding overstating its capabilities**.

Produce **technical guidance** and **standards** for risk mitigation when developing generative AI solutions.

Sources: Accenture AI Governance Guide, From AI compliance to competitive advantage: Becoming responsible by design

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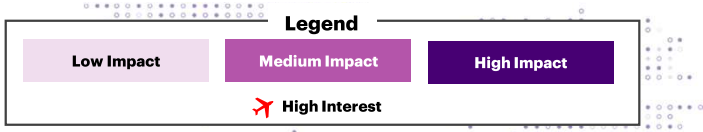
HR as a function will be heavily impacted by GenAI

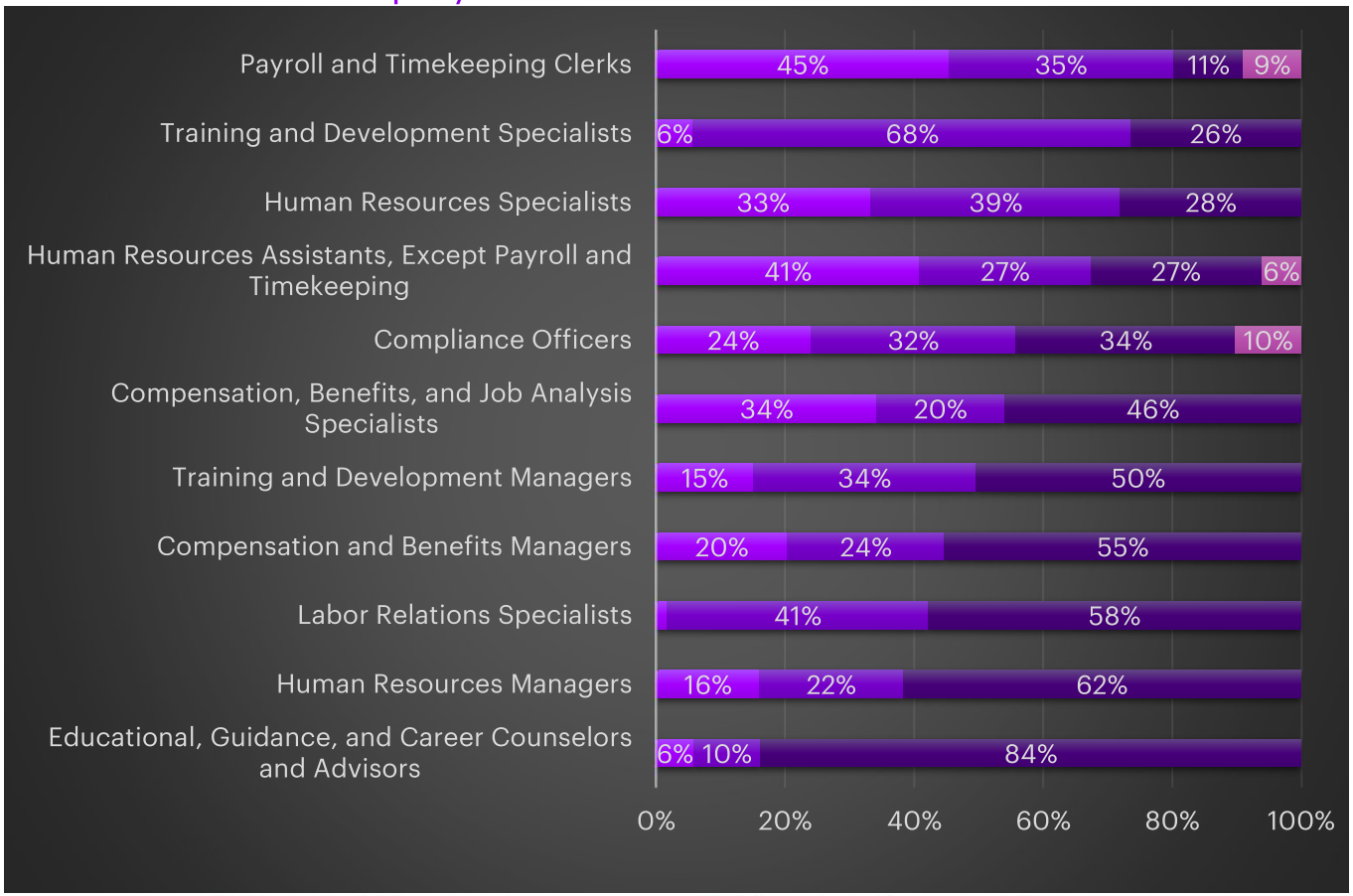


GenAI will impact different HR functions at various tiers, reshaping processes, augmenting decision-making, and amplifying strategic workforce management

Employee Cycle *(Individual hire to retire)*	**Recruitment and Onboarding**	**Skills & Learning Management**	**Performance Management & Career Development**	**Employee Communications**	**Compensation & Benefits**	**HR Service Delivery**
Employee Experiences	HR Concierge					
	Employer Branding	Virtual Coaching	Goal Setting	Targeted Employee Listening	Benefits Concierge	Self service Transactions
	Recruiting and Onboarding Concierge	Personalized Learning Experiences	Internal Mobility	Communication	Comp and Benefits Solutioning	Employee Next Best Action
		Upskilling	Career Pathway Guidance			
		Custom Content Generation	Performance Assessment			
	JD Creation	Gap Analysis	Succession Planning	Sentiment Analysis	Pay Equity Analytics	HR Ops Automation
	Talent Sourcing	Talent Strategy			Workforce Pay Analytics	Knowledge for Performing Complex Activities
	Recruitment Channel optimization					
	Referrals					
	Candidate Screening and Assessment					
Organization Cycle *(Org HR Processes)*	**Workforce Planning**	**Strategic HRBP**	**People Analytics**	**Inclusion & Diversity**	**Resource Planning**	**HR Data Governance**
	Strategic Workforce Planning and Optimization	Business Reporting & Analytic insights	Tech Assessment & Roadmap	I&D Strategy	Resource to role matching	Documentation generation and reviews
	Fulfilment Strategy	Alignment of HR to BU priorities	Adoption & Training	Bias Detection	Resource Scheduling & Optimization	

For HR, this means that some roles will be automated but many more will be augmented

Based on their employment levels in the US in 2022

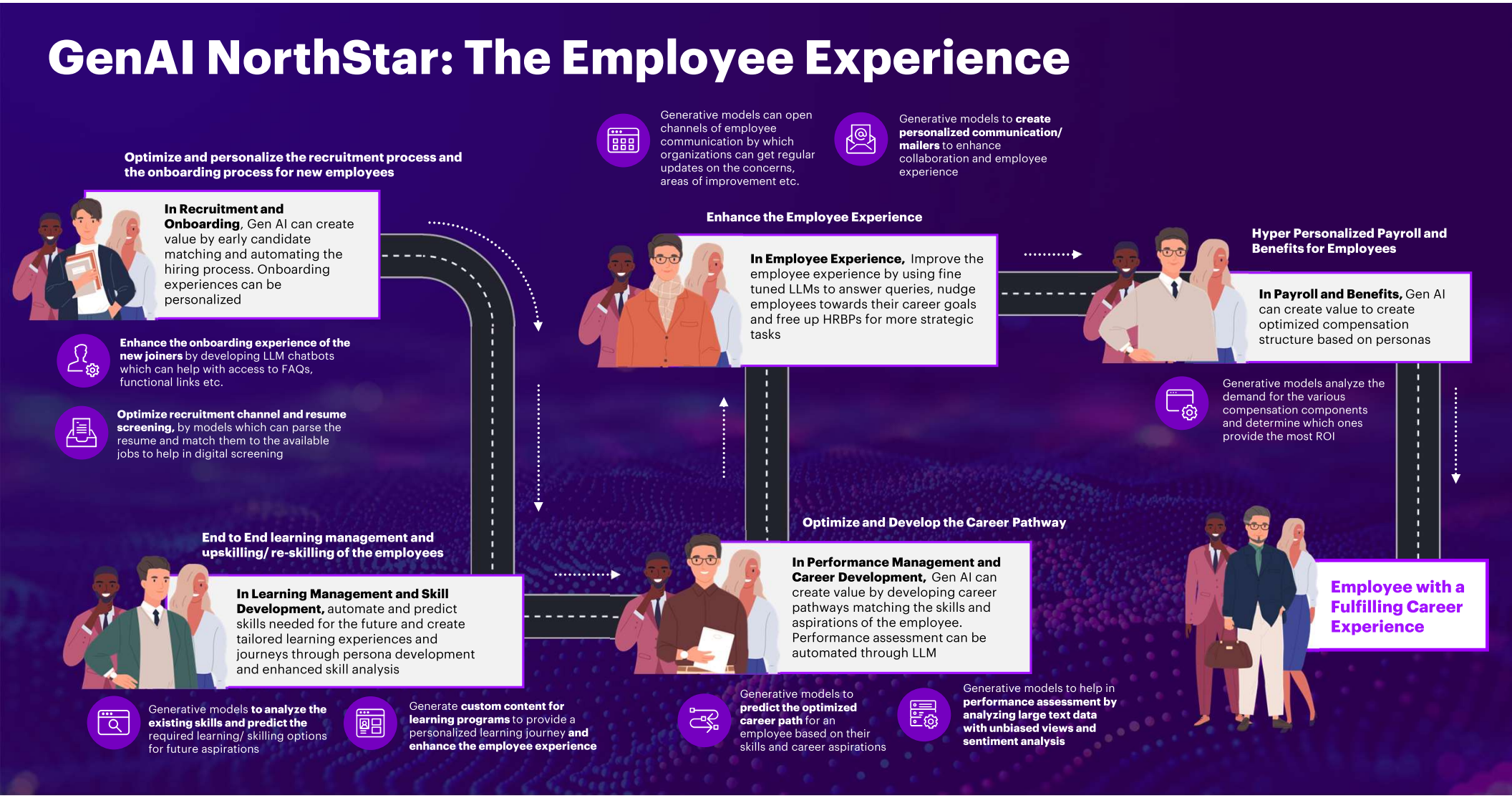


In **6 out of 11** HR specific occupations, GenAI can affect more than half of all hours worked

Notes: Estimates are based on intersection of GPT-4 and manual identification of 209 tasks related to language (out of 332 included in BLS), which were linked to industries using their share in each occupation and the occupations' employment level in each job category. Tasks with higher potential for automation can be transformed by LLMs with reduced involvement from a human worker. Tasks with higher potential for augmentation are those in which LLMs would need more involvement from human workers.

Accenture Research based on BLS and O*Net.

GenAI NorthStar: The Employee Experience



Components of Employee experiences that could be impacted by Gen AI

Actions for NASPE Members

- Stay Up to Speed with the Latest Trends
- Engage in State Policy Development Workgroups
- Evaluate your Learning Offerings to Upskill State Employees
- Consider Application of AI / GenAI in HR Processes
- Prepare to Update Job Architecture as Work Evolves

Q & A

EMBRACE DISRUPTION: THE BEST WAY TO PREDICT THE FUTURE IS TO INVENT IT