



Leadership Vision for 2024

**Top 3 Strategic Priorities for
Research & Development Leaders**

Leadership Vision for Heads of R&D in 2024

Increased cost pressure, scarcity of critical talent, external partner volatility, macroeconomic uncertainty and decreased employee engagement are shaping how the best organizations will manage R&D in 2024.

In this context, R&D leaders' top priorities for 2024 are:

- Speeding up efficiency
- Increasing productivity with disruptive technology and AI
- Finding, attracting and retaining top tech talent

Heads of R&D can use this research to stay ahead of major trends and lead their teams toward a successful future.

Key questions addressed:

- ① What are the major trends affecting Heads of R&D?
- ① What are R&D leaders' major challenges and top priorities?
- ① What actions should R&D leaders take now to be successful?



What are the major trends impacting R&D leaders?

Trend: Volatility Adds Complexity to R&D Operations

Changes in the External Environment



Ongoing Global Market Volatility



Geopolitical Landscape Shifts and Unrest



Megatrends and Their Potential Impacts



Separating Hype From Reality on Emerging Technologies



Regulatory Changes and Unpredictability



Navigating Supply Chain Disruptions (Again)



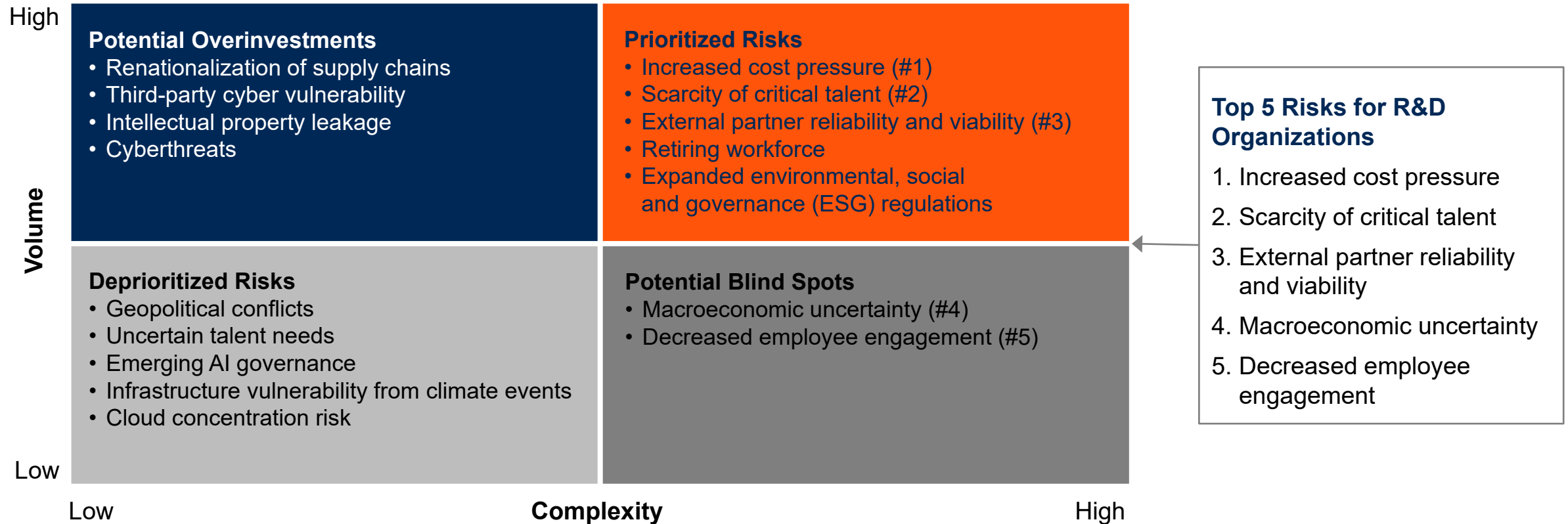
Increased Cost Pressures

Source: Gartner

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Tailor Resourcing to Role-Specific Hiring Needs

Recruiting Operating Model Segmentation Framework

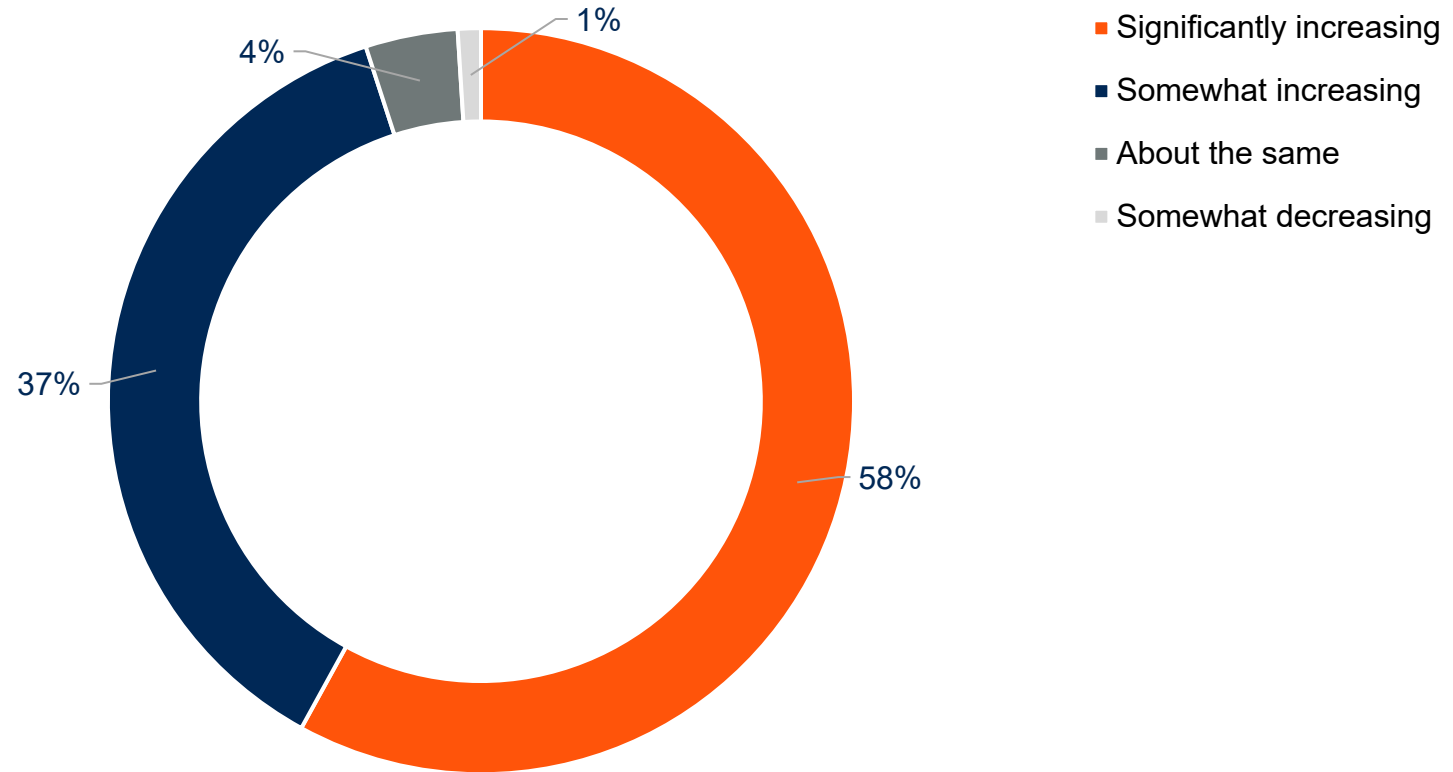


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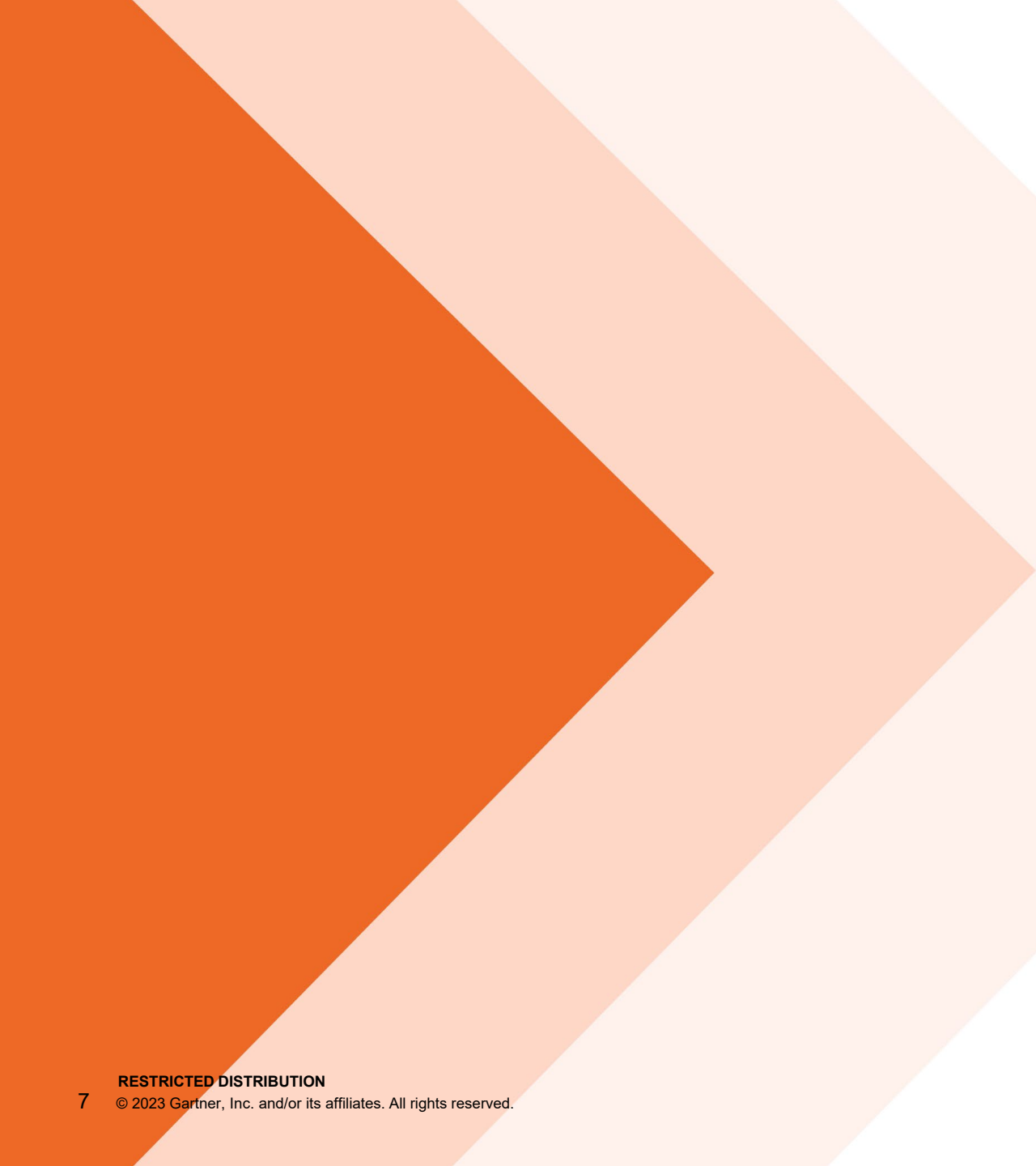
Trend: Rate of Technology Change Accelerates

How Would You Characterize the Rate of Change of Technology and Trends?



n = 103
Source: Gartner

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What are the top challenges impacting R&D leaders?

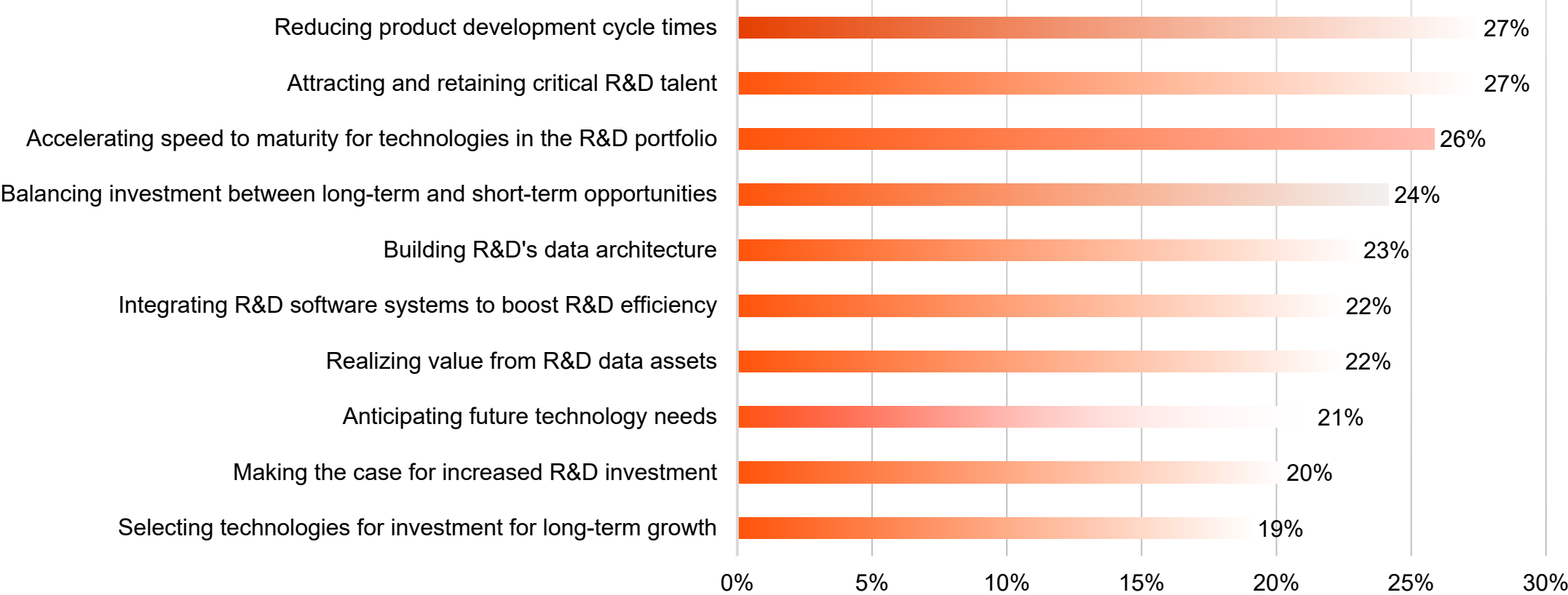
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Challenge: R&D Leaders Are Being Asked to Deliver Speed and Efficiency

Top R&D Leaders Challenges for 2024



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Challenge: New Technologies Significantly Disrupt R&D Operations

GenAI Use Cases and Productivity Impact for R&D

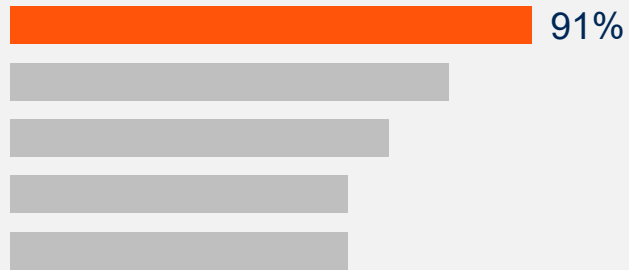
Use Case	Productivity Effect
Generative Design	Increased potential solutions
Ideation	More and better ideas faster
Sentiment Analysis	Augment voice of customer
Patent Analysis	Augment freedom to operate determination
Simulation	Reduced burden for DOEs
Prediction	Accurate time to failure for equipment
Synthetic Data	Augment small data training set
Material Science	Reduced time to material testing

Source: Gartner

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Challenge: Attracting and Retaining Critical Technical Talent

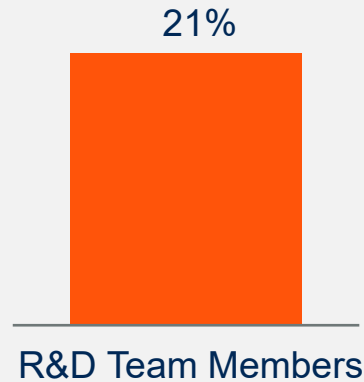
A Top R&D Leader Priority



91% of R&D Leaders report **attracting and retaining critical talent** is a key priority for 2024.

Q. Please indicate how important each of the following priorities is for the overall performance of your R&D function in 2024?
n = 111

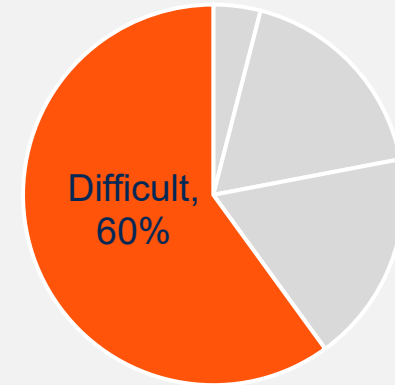
Lagging Engagement



Only 21% of R&D team members report they are **highly engaged**.

Q.: Please indicate how important each of the following priorities is for the overall performance of your R&D function in 2024?
n = 111

Highly Difficult to Fill Open Roles



60% of R&D Leaders say it's **difficult to fill open roles** in the R&D Organization.

Q. How would you characterize the ease or difficulty of filling open roles in the R&D organization?
n = 111

Source: Gartner

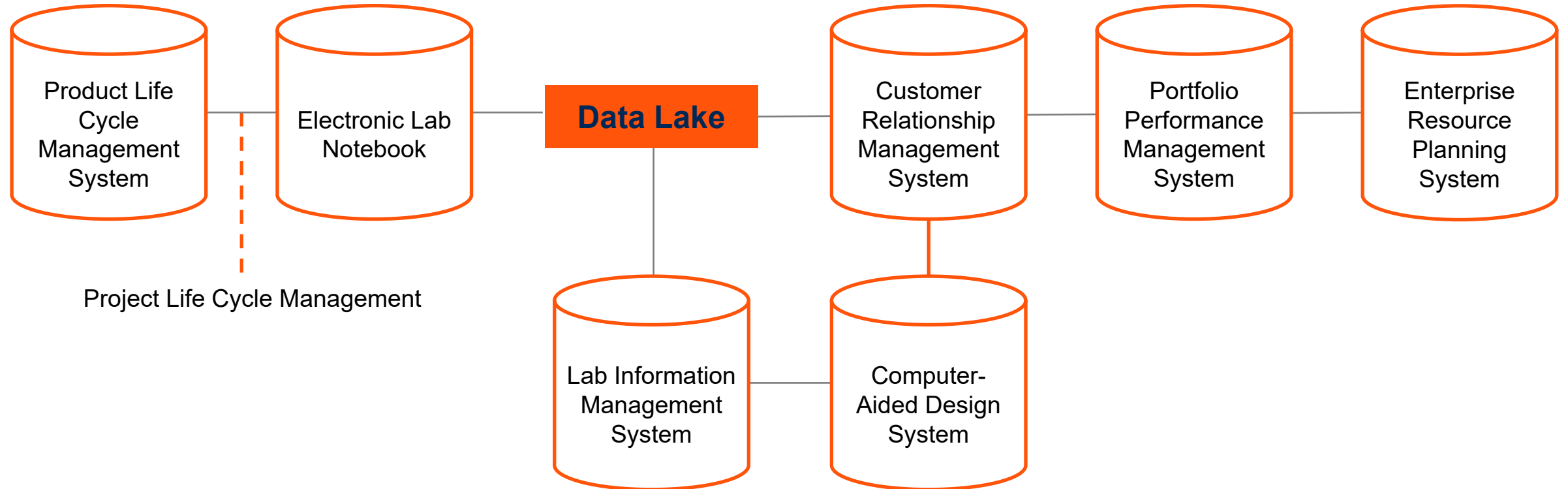
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What actions should R&D leaders take now to be successful?

Action: Build the Digitalized R&D Ecosystem

Digitalized R&D Ecosystem Using PLM as the Digital Thread



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Action: Use Technology Interventions to Target “Slow” Steps

Sample R&D Slow Steps



Preclinical design and testing, design-make-test-analyze cycle



Design of experiments



Formulation optimization



Performance optimization



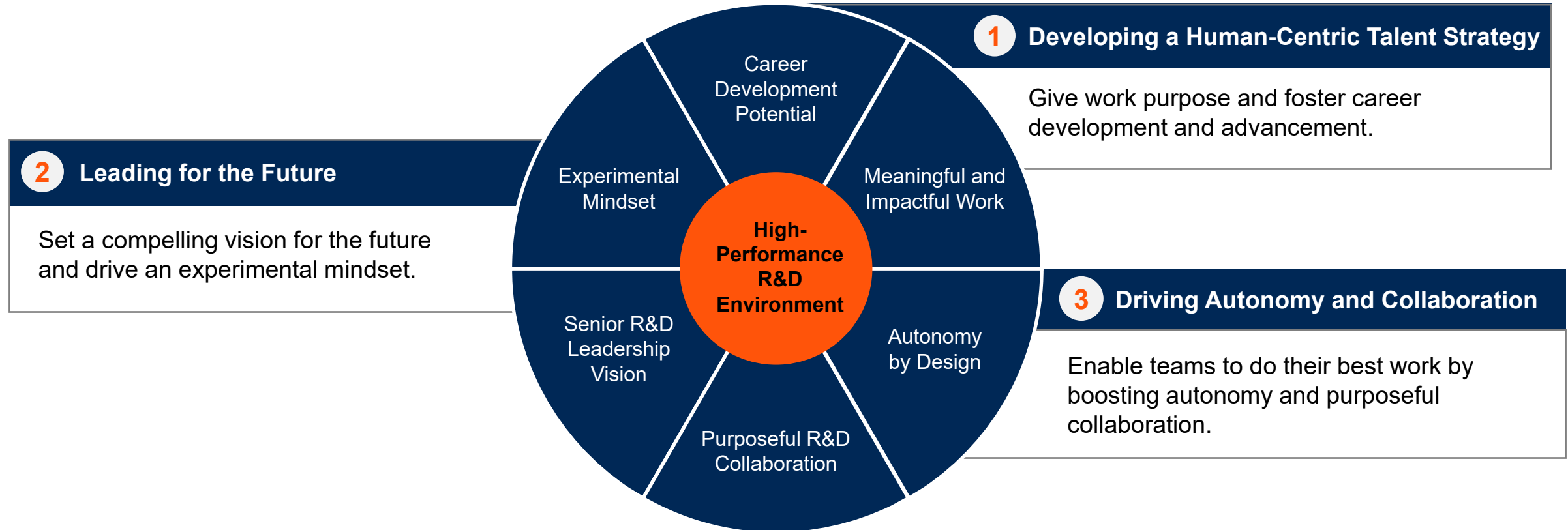
Process optimization

Source: Gartner

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Action: Create an Environment That Engages and Retains Critical R&D Staff

Drivers of the High-Performance R&D Environment



Source: Gartner

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Actionable, objective insight

Position your organization for success. Explore these additional complimentary resources and tools for R&D leaders:

Research



Connect Your R&D Strategy to Business Goals

Construct a strategic, balanced portfolio to deliver long-term growth.

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Guide



Building a Robust R&D Portfolio

Understand five critical portfolio management challenges and tactics to overcome them.

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Tool



Gartner R&D Score

Measure the maturity of your function, prioritize areas of improvement and plot the path to maturity.

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Webinar



R&D Expert Events

Explore an expert deep dive on the latest top priorities for R&D leaders.

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