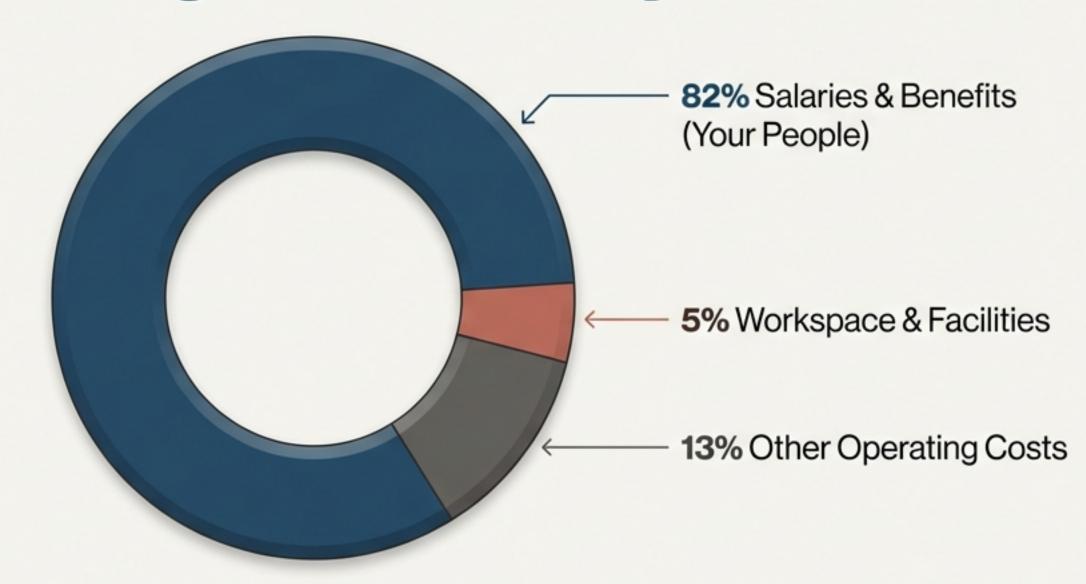
## The 82/5 Rule: Where Your Operatilng Costs Really Go



Staff expenses represent approximately **82%** of organizational operating costs. Physical workspace represents only **5%**. This presentation examines a critical question: **Are we optimizing the 5% at the expense of the 82%**?

## The Open-Plan Office is Now the Global Standard

Over 70% of U.S. office workers now occupy open-plan spaces, a shift driven by powerful incentives.



#### **Financial Optimization**

Higher worker density per square meter. Lower construction costs (fewer walls). Reduced HVAC and maintenance expenses.



#### Space Efficiency

Addresses perceived inefficiency.

Peak office utilization is estimated at merely 42% on any given day, seemingly justifying designs that maximize spatial return.



#### **Evolving Work & Technology**

A narrative that open designs foster collaboration for knowledge-based work. Technological mobility untethered work from fixed locations, making assigned desks seem inefficient.

The business case for open-plan offices is built on visible, tangible savings that appear directly on financial statements.

## A Troubling Disconnect: The Promise vs. The Reality

#### Conventional Wisdom



Boosts Collaboration



Sparks Innovation



Saves Money



Increases Flexibility "While balance sheets capture construction savings, they fail to quantify the intangible costs."

The Evidence from 31 Peer-Reviewed Studies



Compromised Concentration



Increased Sick Leave



**Elevated Stress** 



Decreased Performance

#### Performance Under Pressure: The Productivity Cost of Distraction

## 38 productivity-related measures were analyzed. The findings trended predominantly negative.



### 1. Compromised Concentration

Workers report a significantly reduced ability to focus on complex tasks due to acoustic and visual distractions.

"Speech, laughter, and telephone ringing represented the most distracting sounds, substantially compromising concentration."



## 2. Decreased Performance & Accuracy

Studies documented decreased task performance and accuracy, particularly in small and medium open-plan configurations.



### 3. Negative Environmental Factors

All studies measuring noise satisfaction found negative associations with open-plan designs. Workers also cited glare, inadequate lighting, poor air quality, and lack of temperature control as negatively affecting their performance.

## The Human Cost: Well-being, Health, and Absenteeism

A synthesis of 32 health-related outcomes across 14 studies revealed predominantly negative associations with open-plan offices.



#### **Elevated Sick Leave**

Multiple large-scale studies found "significantly higher sick leave rates" and "elevated short-term sick leave" in openplan vs. cellular office workers.



#### **Increased Stress**

Four separate studies found elevated stress levels in open-plan configurations.



#### **Compromised Health**

Workers report higher risk of common colds, increased headaches, eye strain, and throat irritation, suggesting increased pathogen transmission and environmental stressors.



#### Pervasive Fatigue

Studies documented negative impacts on sleep quality and higher levels of tiredness, suggesting workplace stress extends beyond working hours.

## A Universal Verdict on Satisfaction and Privacy

# 31 out of 31

Across 21 studies, ALL satisfaction-related measures trended negative for open-plan configurations compared to cellular offices. There were zero positive findings.

#### **Overall Dissatisfaction**

Every study measuring general work environment or job satisfaction found negative associations.

#### **Inadequate Privacy**

Workers consistently reported inadequate privacy for concentrated work, confidential conversations, and personal matters.

#### **Diminished Control**

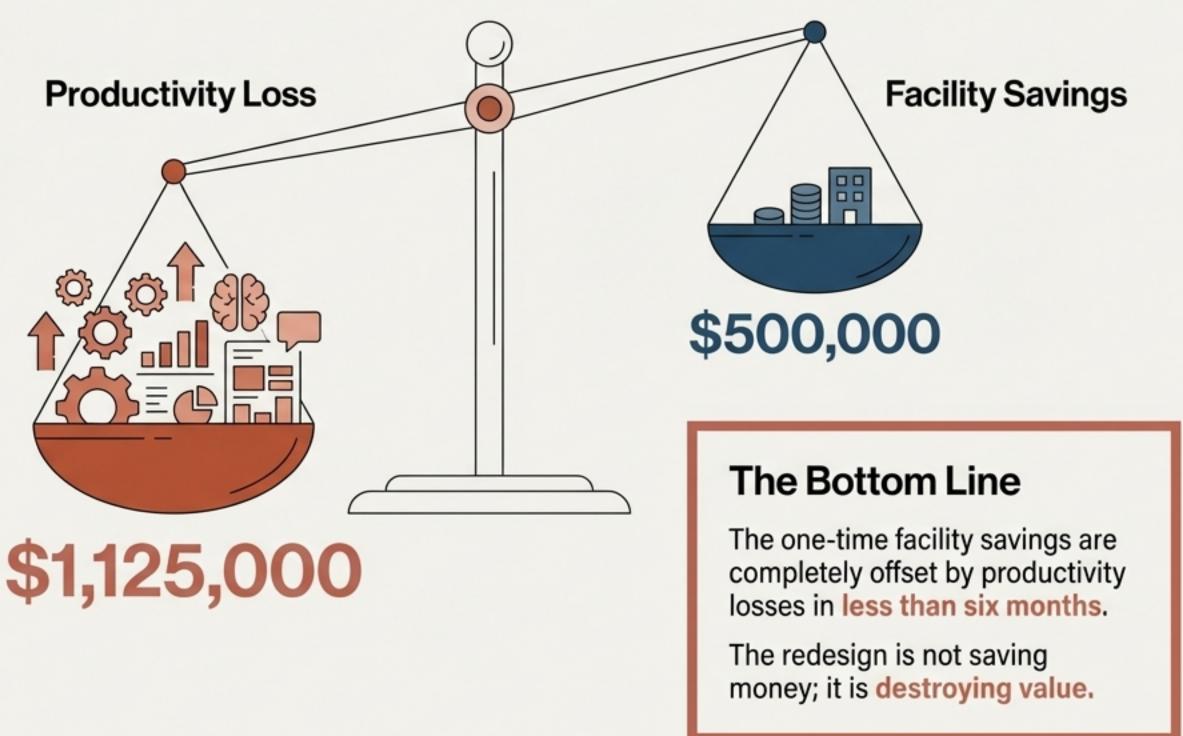
Reduced personalization, lack of control over noise, temperature, and lighting, and feelings of being "cramped" diminished workers' sense of autonomy.

#### The Hidden Ledger: When Productivity Loss Annihilates Facility Savings

If staff costs are 82% of expenses, even modest productivity decrements can have massive financial consequences.

## A Conservative Calculation

- Organization
  200 employees
- S Average Compensation
  \$75,000 / year
- Total Annual Staff Cost \$15,000,000
- One-Time Redesign Savings \$500,000
- Productivity Loss (7.5%)
  A 7.5% loss due to distraction and compromised concentration equals \$1,125,000 in diminished output annually.



## The Path Forward: An Evidence-Based Playbook

The research does not suggest a mandatory return to cellular offices. Instead, it points to a portfolio of evidence-based interventions that mitigate negative outcomes while preserving spatial efficiencies.



#### **Immediate Interventions**

**Focus:** High-impact fixes for your existing spaces.

#### You will learn:

- How to master the soundscape and enhance privacy.
- How to provide meaningful choice and individual control.



#### **Strategic Capabilities**

**Focus:** Long-term organizational shifts for future-proofing your workplace.

#### You will learn:

- How to build a responsive, data-driven system.
- How to integrate workplace strategy with culture and purpose.

### Playbook: Master the Soundscape & Enhance Privacy

**Evidence Foundation:** Noise is the most problematic open-plan characteristic. All studies measuring privacy satisfaction found negative associations.

#### **Effective Approaches**



 Acoustic Management: Install sound-absorbing materials (ceiling tiles, panels, carpeting). Deploy white noise / sound masking systems.



 Strategic Zoning: Separate quiet focus zones from high-interaction collaborative areas. Establish and enforce workplace norms on noise.



 Privacy Enhancements: Use strategically positioned screens and partitions. Create private alcoves or semi-enclosed spaces for calls and confidential work.

#### **Proof Points**

#### **PHILIPS**

Implemented comprehensive acoustic improvements (sound-absorbing ceilings, acoustic furniture, sound masking) in their Dutch HQ, which stabilized productivity metrics that had previously declined long-term after relocations.

#### **II ERNST & YOUNG**

Deployed directional acoustic panels and private alcoves in their Chicago office, resulting in a 45% improvement in privacy satisfaction and a 30% reduction in reported distractions.

## Playbook: Provide Choice & Individual Control

**Evidence Foundation:** Lack of control over workspace conditions and the inability to find task-appropriate environments consistently correlate with reduced satisfaction and well-being.

#### **Effective Approaches**



Flexible Zoning: Provide a variety of reservable quiet rooms, focus booths, and collaboration zones. Ensure generous provision ratios so spaces are reliably available.



Individual Environmental Controls: Equip desks with controllable task lighting, personal ventilation/heating, and adjustable furniture (e.g., sit-stand desks).



Acoustic Privacy Tools: Provide access to noise-canceling headphones or personal white noise devices.

#### **Proof Points**



Designed their Netherlands HQ with comprehensive workspace variety. Quiet rooms and focus booths see 70-85% occupancy during peak demand, mitigating open-plan concerns.

#### Deloitte.

Piloted personalized environmental controls (task lighting, radiant heating) in their Amsterdam office, leading to a 40% improvement in thermal comfort satisfaction and a 12% decrease in sick leave in the pilot area.

### Capability: Build a Responsive, Data-Driven Workplace

**Evidence Foundation:** The most effective organizations move beyond one-time design decisions toward continuous, data-driven optimization.

#### **Effective Approaches**



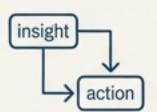
 Continuous Monitoring: Deploy sensor networks to track environmental quality (CO<sub>2</sub>, noise, light) and utilization patterns anonymously.



 Integrate Feedback: Correlate sensor data with regular employee pulse surveys and business outcomes (e.g., sick leave, retention).



 Distributed Governance: Empower teams with budgets and authority for local customization (furniture, layout) within defined standards.



 Establish Responsive Protocols: Create clear processes for investigating data-driven insights and implementing adjustments (e.g., HVAC changes, acoustic additions).

#### **Proof Points**



Uses comprehensive environmental sensors in its SF tower. Data led to HVAC adjustments, acoustic panel installations, and task lighting provisions, improving workplace satisfaction scores by 18% over three years.



Implemented distributed governance, allowing teams to customize layouts and individuals to select desk types. 55% of workers reported "significant control" over their workspace, up from 12% previously.

## Capability: Integrate Workplace Strategy with Culture & Purpose

Evidence Foundation: Negative outcomes often intensify over time, suggesting violated psychological contracts. Integrating design with culture helps workers understand the 'why' beyond cost.

#### **Effective Approaches**



Participatory Design: Involve workers in the design process through workshops, surveys, and mockup evaluations to build buy-in.



Transparent Communication: Clearly explain design rationales, honestly acknowledge trade-offs, and detail mitigation investments.



Leadership Modeling: Ensure executives and senior leaders work in similar configurations to demonstrate shared experience.



Mission-Aligned Rationale: Explicitly connect design choices to organizational purpose (e.g., densification for sustainability, openness for egalitarian values).

#### **Proof Points**

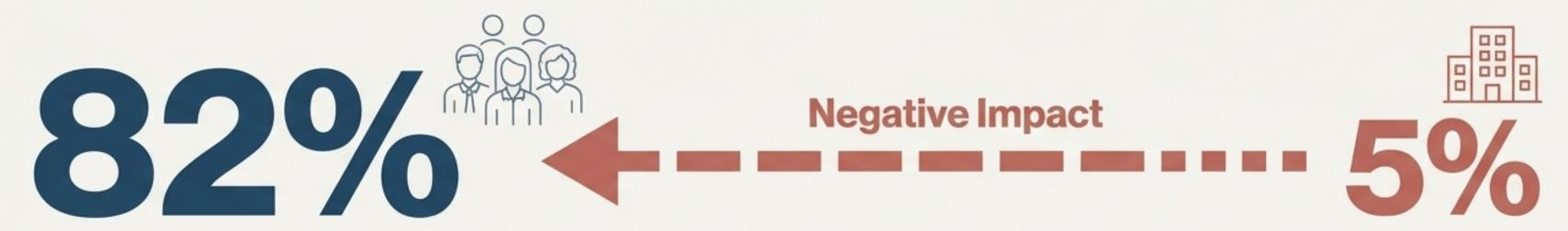


Engaged in an 18-month participatory design process for a new federal building, resulting in significantly higher satisfaction (65% vs. 42% in comparable facilities) and lower sick leave.



Explicitly connects its open-plan design to its environmental mission (reduced footprint) and egalitarian culture. This rationale, combined with offsetting benefits (flex time), leads to higher worker acceptance of trade-offs.

# The Choice: Holistic Value Creation vs. Siloed Cost-Cutting



The widespread adoption of open-plan offices has been driven by optimizing the 5% of costs (facilities) while systematically underestimating the negative impact on the 82% (people).

The evidence is clear: the intangible costs of compromised health, satisfaction, and productivity are real, substantial, and frequently outweigh any facility savings.

An office is not just an expense to be minimized; it is a tool that can either enable or undermine your organization's most valuable asset.

## Actionable Principles for Leadership

Moving forward, workplace design decisions should be viewed as a test of strategic leadership.

#### Calculate Holistically.

Demand cost-benefit analyses that quantify productivity impacts, not just construction savings.



## Acknowledge Trade-offs Honestly.

Abandon aspirational collaboration narratives. Communicate openly and invest adequately in mitigation.



## Provide Meaningful Choice.

One size fits no one. Offer a variety of spaces and flexible policies to support diverse work patterns and needs.



## Monitor and Adapt Continuously.

Treat your workplace as a dynamic system, not a static asset. Use data and feedback to drive constant improvement.

The best workplace strategy doesn't just manage costs; it deliberately invests in the health, well-being, and performance of its people.