

The Human Factor: Quantifying Human Risk

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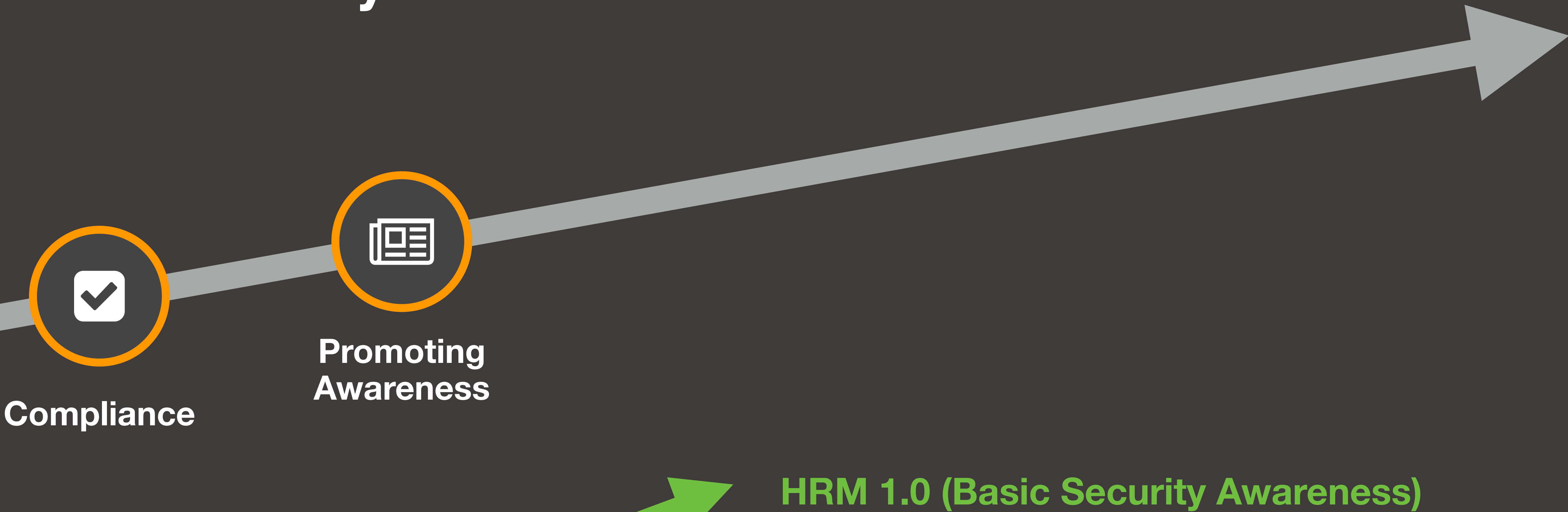
Novacoast - Director, Data Analytics and Risk

Human Risk Management

Strategy for identifying, reporting on, and responding to human-caused risks in an organization



HRM Maturity Model



Human Risk Quantification



Risk

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Quantification



The Analysis Placebo

	Negligible (<\$10K)	Minor (\$10K-\$100K)	Moderate (\$100K-\$1M)	Critical (\$1M-\$10M)	Catastrophic (>\$10M)
Frequent (99%+)	Medium	Medium	High	High	High
Likely (51%-98%)	Medium	Medium	Medium	High	High
Occasional (26%-50%)	Low	Medium	Medium	Medium	High
Seldom (1%-25%)	Low	Low	Medium	Medium	Medium
Improbable (<1%)	Low	Low	Low	Medium	Medium

The Analysis Placebo

Risk A: Likelihood **50%**; Impact **\$9 million**
Expected loss \$4.5 million **Medium**

Risk B: Likelihood **60%**; Impact **\$2 million**
Expected loss \$1.2 million **High**

	Negligible (<\$10K)	Minor (\$10K-\$100K)	Moderate (\$100K-\$1M)	Critical (\$1M-\$10M)	Catastrophic (>\$10M)
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Human



The Towel Debate



The Towel Debate



"75% of guests in this hotel reuse their towels"

"75% of guests in this room reuse their towels"

The Towel Debate

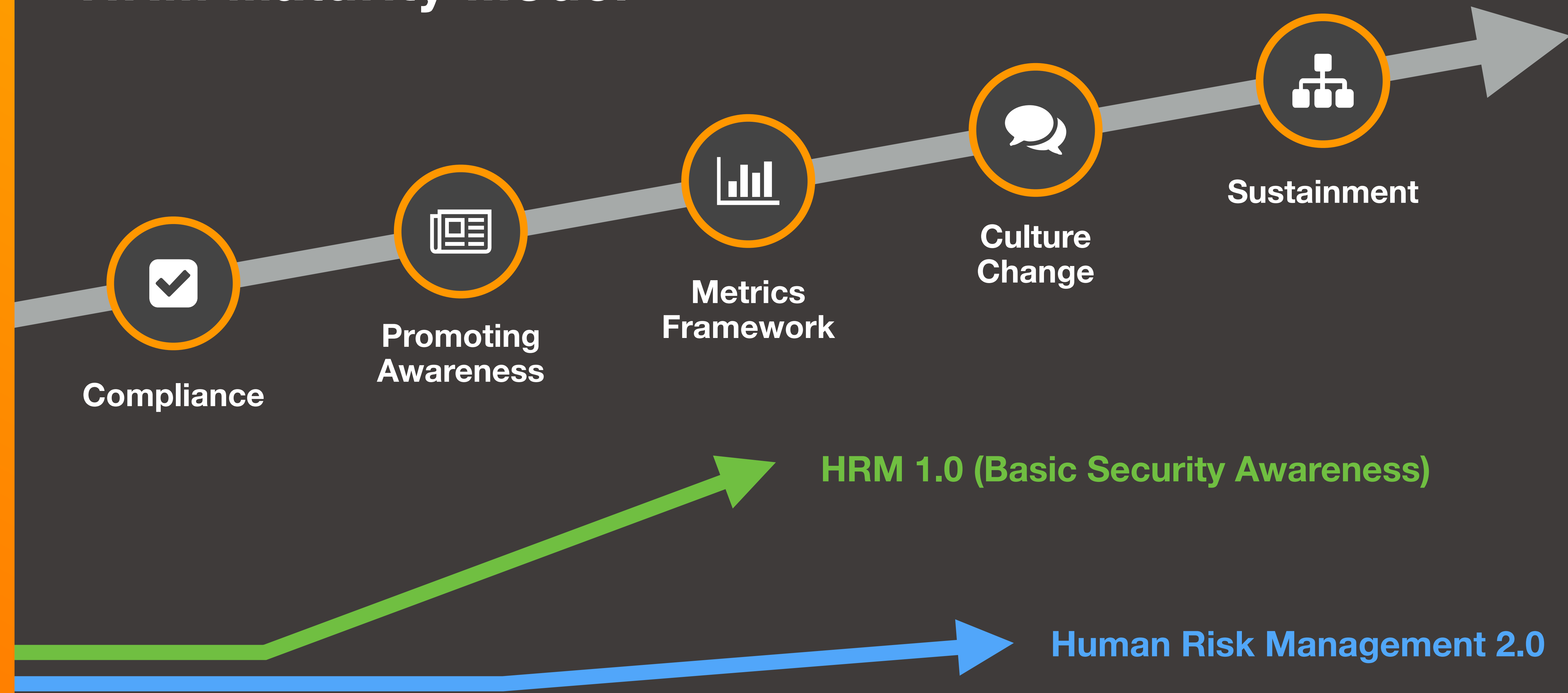


1 **vs** **1.6**
Room Hotel

Human Risk Quantification



HRM Maturity Model



Expanding our view of security behaviors

Web and endpoint security

- Attempts to install unauthorized software
- Attempts to access dangerous websites
- Mobile device updates
- Detection of malware

Phishing and email security

- Phishing simulations: User actions for clicks, data entry, attachments
- Real phishing: User clicking and reporting actions on real phishing emails
- Real phishing: Detection of malware from email links and attachments

Data loss & privacy security

- Attempts to send plain text passwords to personal email
- Detection of policy violations
- Blocks of share site uploads/downloads

Security training

- Status of annual compliance training
- Status of new hire training
- Status of assigned training
- Phishing School
- Security training for risk mitigation actions

Access and authentication account compromise

- Self-Service password resets
- Risky logins



Humans Aren't Optimal



Thank You

“75% of the people in this room will connect with me on LinkedIn”

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