



Insight into SSDs impact on Client Notebooks

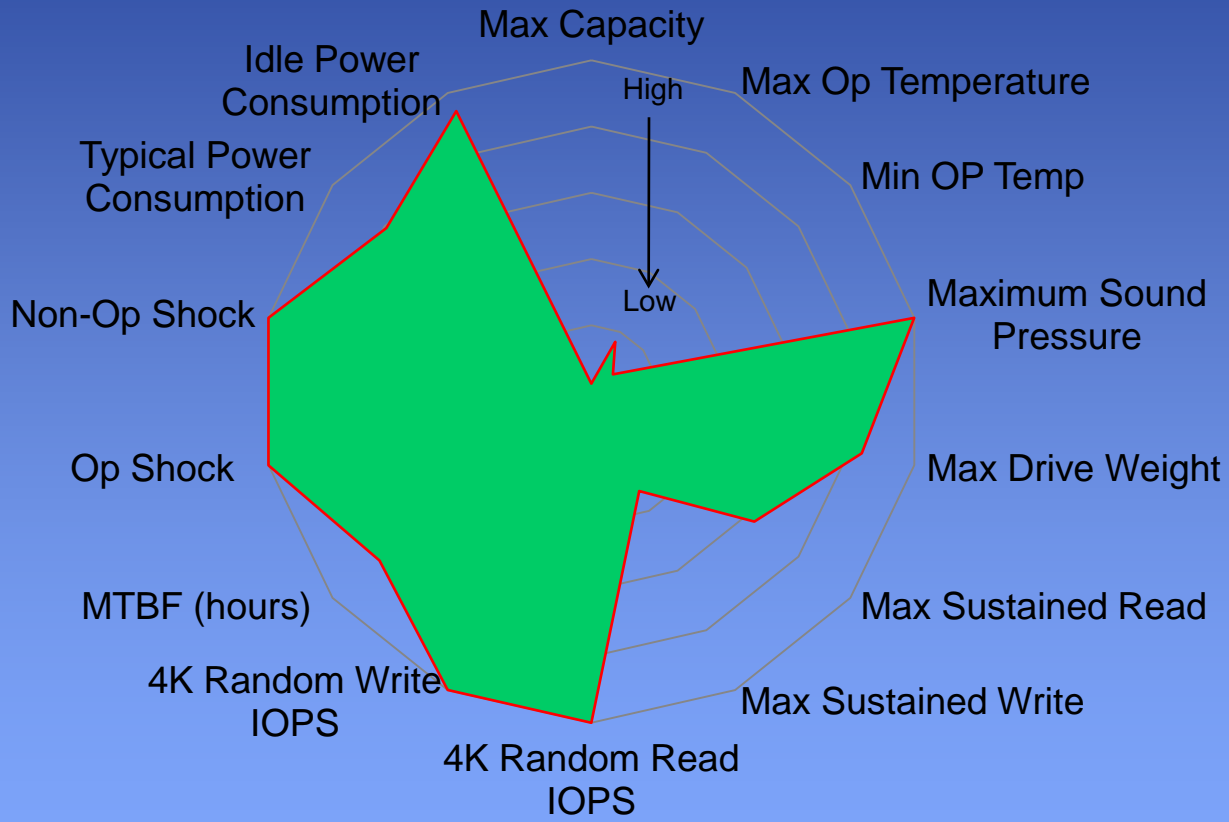
Munif Farhan
Client Storage Senior Engineer
Dell Inc.

SSDs in Dell

- SSDs offered on more than 20 Business and Consumer platforms
 - Enablement's with SSD:
 - System responsiveness
 - High performance: workstation & gaming applications
 - Form factor/design: flexibility, low z-height and weight reduction
 - Durability and reliability
 - Intelligent power: performance and mobility
 - Commitment to SSDs
 - Some platforms designed as SSD only

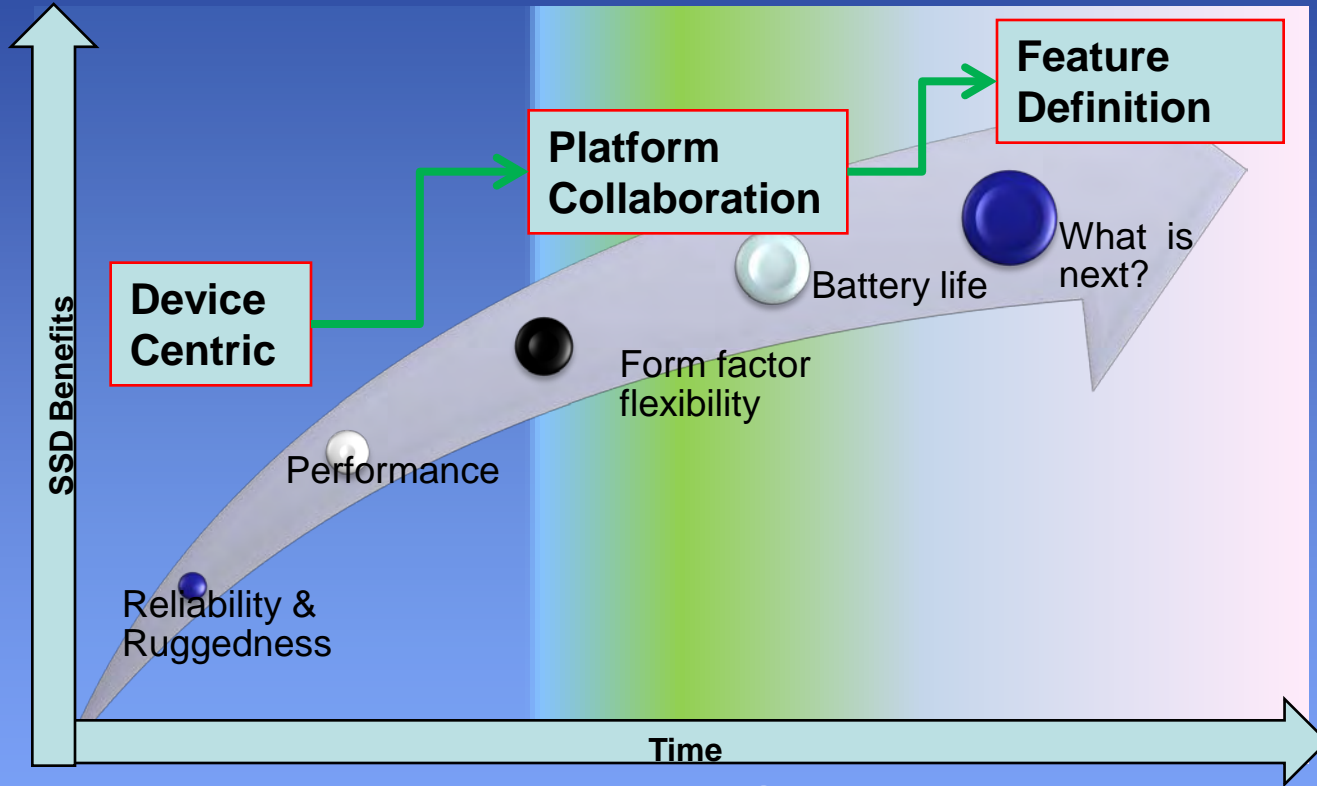


SSD Improvement Compared to 2.5" HDD



Device level benefits must translate to system level

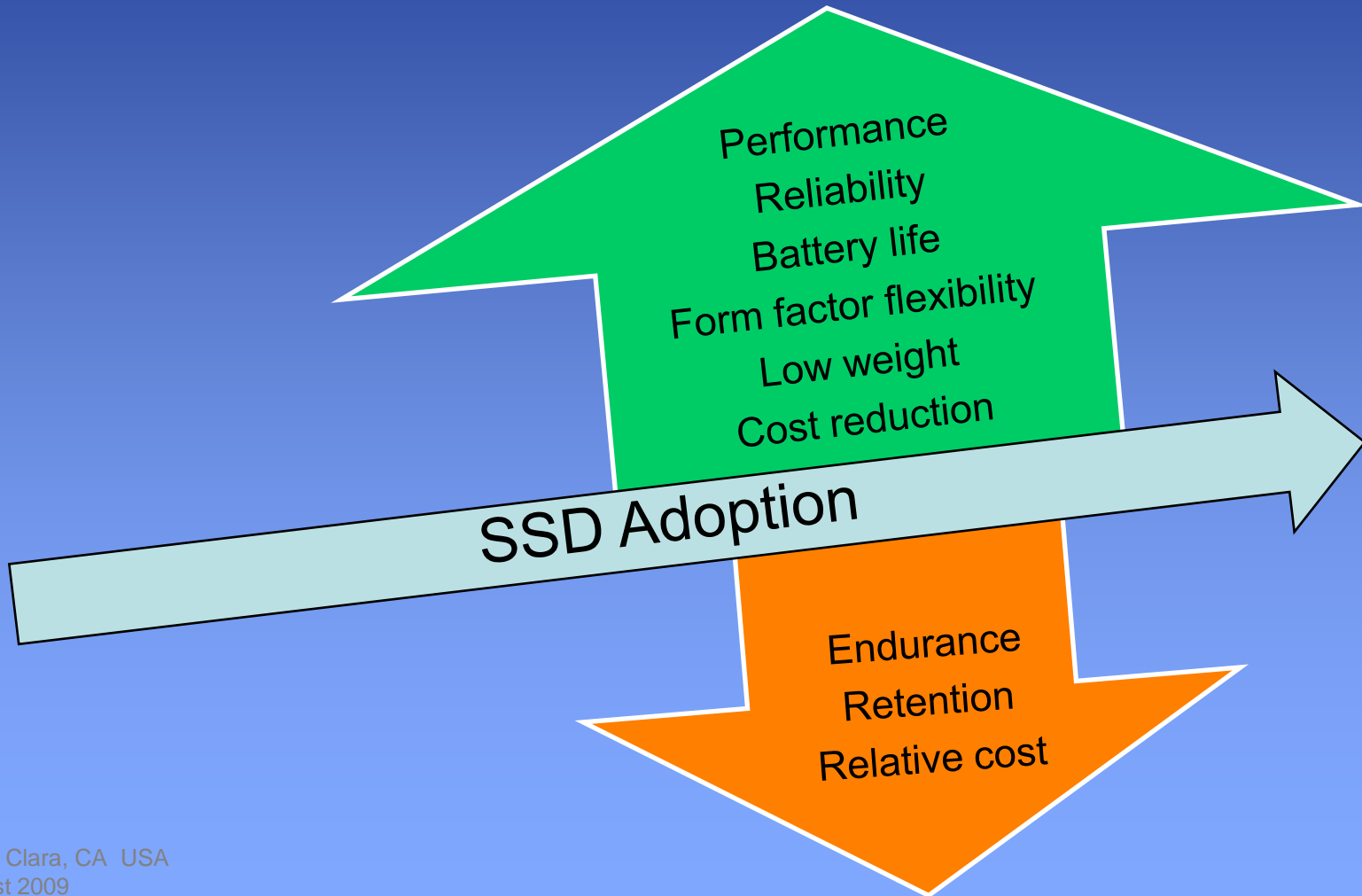
SSD Benefit Progression



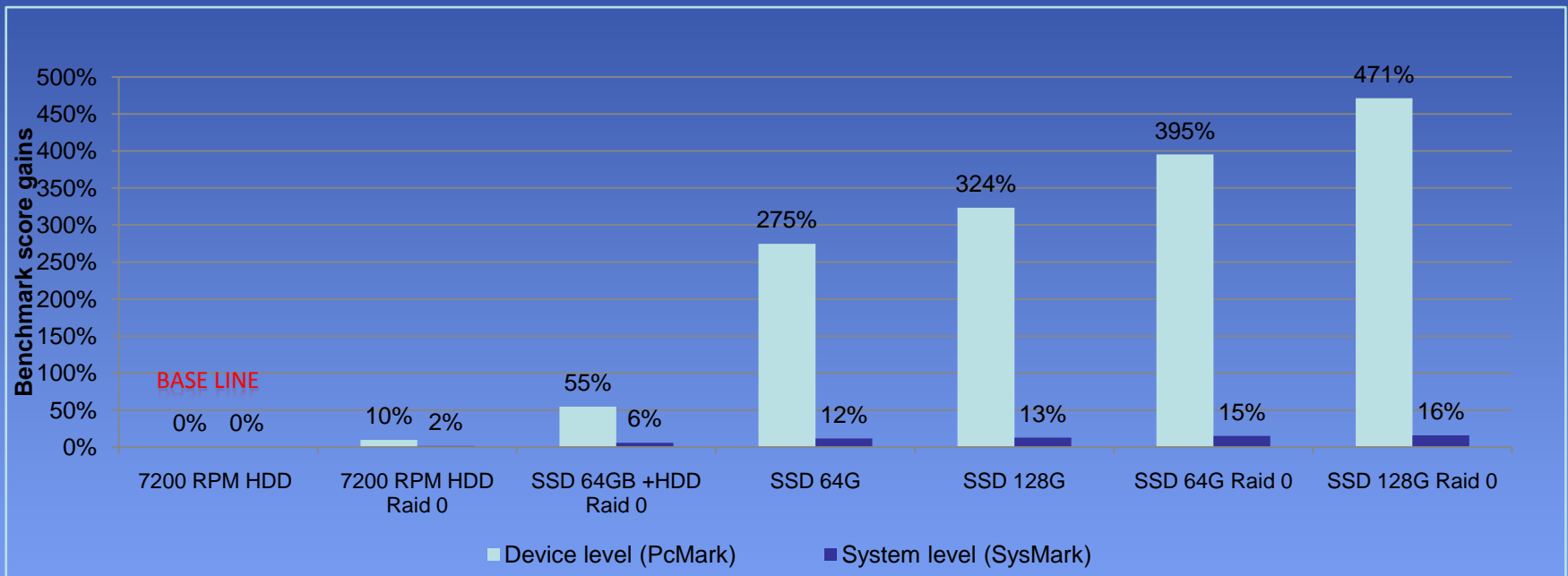
Key established benefits today. System level focused features are next!!

Device and system collaboration is the key for new feature definition.

SSD Adoption



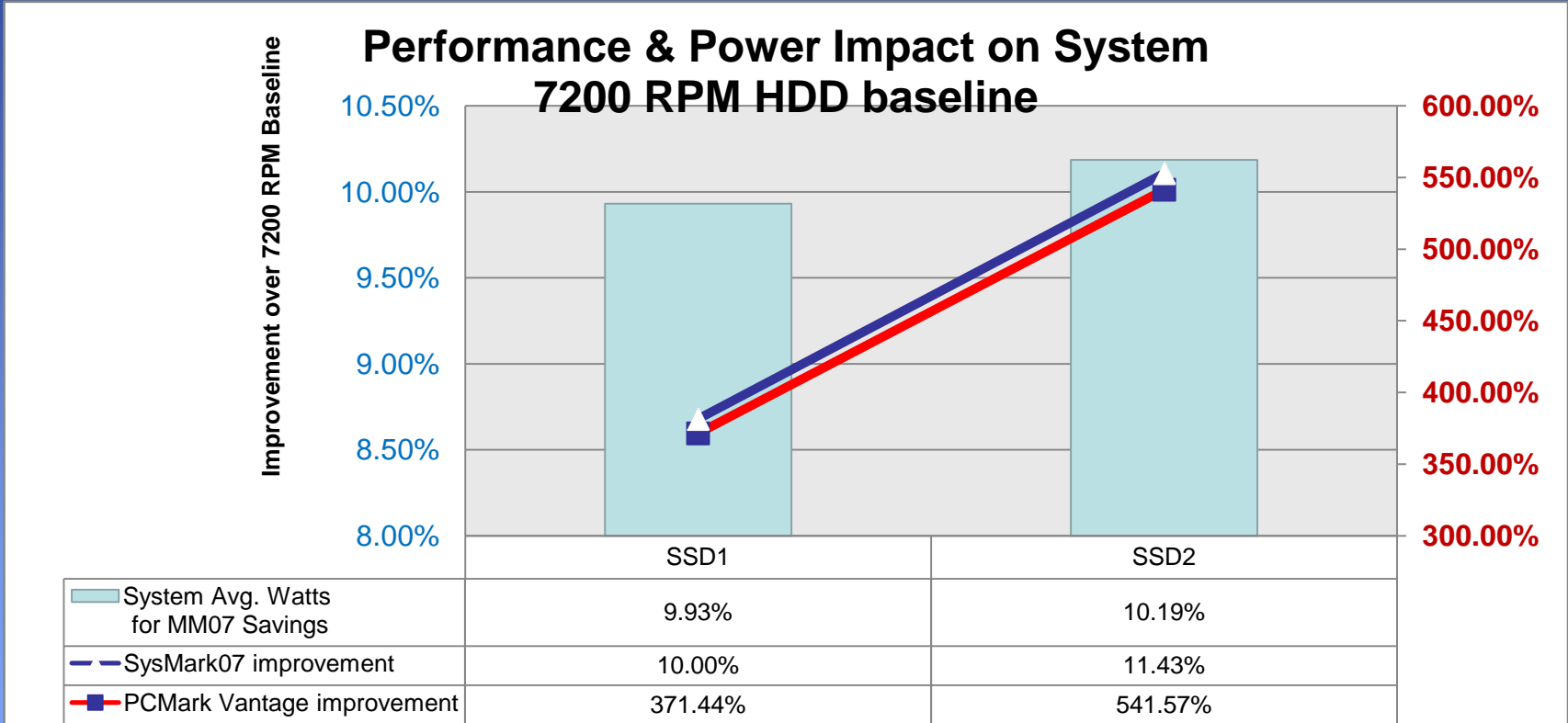
Device Level Performance Impact On System Performance



Significant device level performance improvements are required to impact overall system level performance

Are we capturing system responsiveness?

Device performance impact on system power



- Higher device performance correlates with higher system power savings
- Intelligent Power: Power management vs power starvation

Summary

- Dell is committed to flash
- Development focus:
 - Current: device centric
 - Future: platform/system focus
 - Dell as a partner
- SSD features are driving fast adoption. Fears to be addressed.
- SSD performance impact on system is relevant
- Intelligent Power is the key to battery life