

# Page Overlays

An Enhanced Virtual Memory Framework to  
Enable Fine-grained Memory Management

**Session 2B – 10:45 AM**

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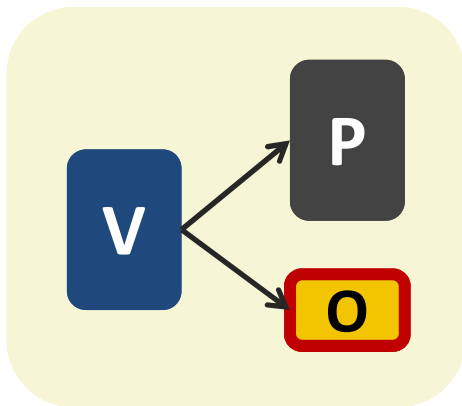
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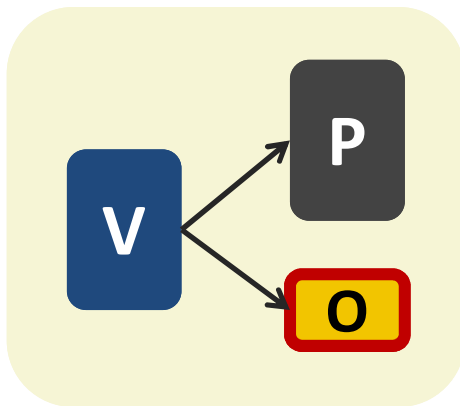
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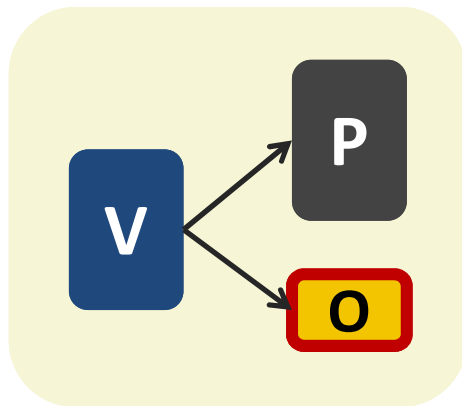
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Largely retains the structure of existing virtual memory systems

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**Powerful Access Semantics → Many applications**

**Efficient copy-on-write**

Sparse data structure representation

Memory checkpointing

Flexible superpages

Fine-grained metadata management

Virtualizing speculation

**Fine-grained deduplication**