Multitenant i Oracle 12.2

"Always on, never stop"

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Oracle Multitenant: What's new in 12.2

NEW IN 12.2

Ease of Provisioning and Tenant Mobility

- Hot Clone
- Refresh Clone
- PDB Relocate

Isolation with Economies of Scale

- 4k PDBs
- Memory & IO Resource Mgt
- Lockdown Profiles

Centralized Management of Application Tenants

- Application Root
- Application Container
- Proxy PDB
- Container Map

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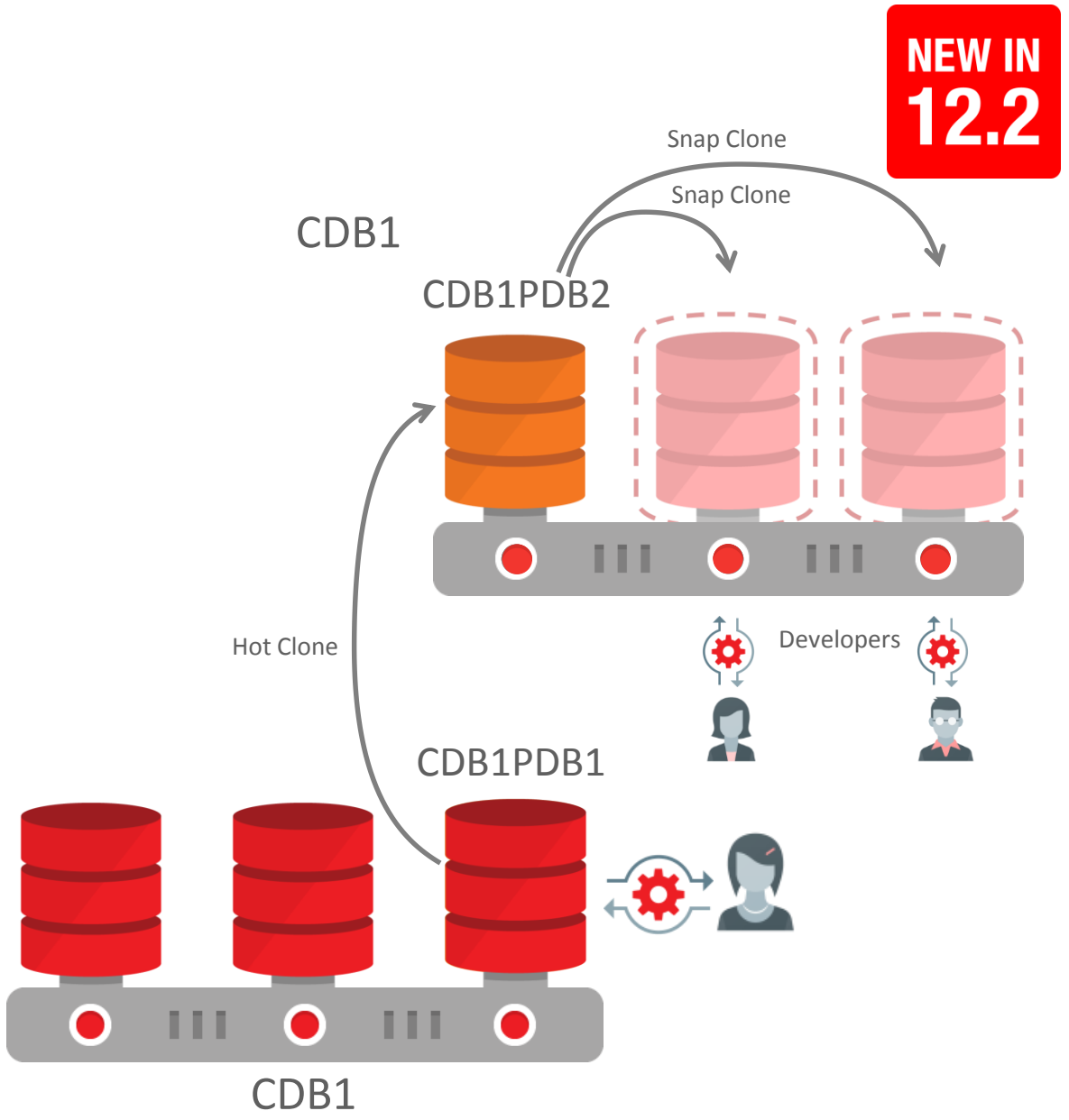
Demos

Multitenant in Oracle DB 12.2

- Demo 1
  - Cloning when Source in Read/Write mode
- Demo 2
  - Create a Refreshable clone
- Demo 3
  - Relocate PDB

PDB Hot Clone

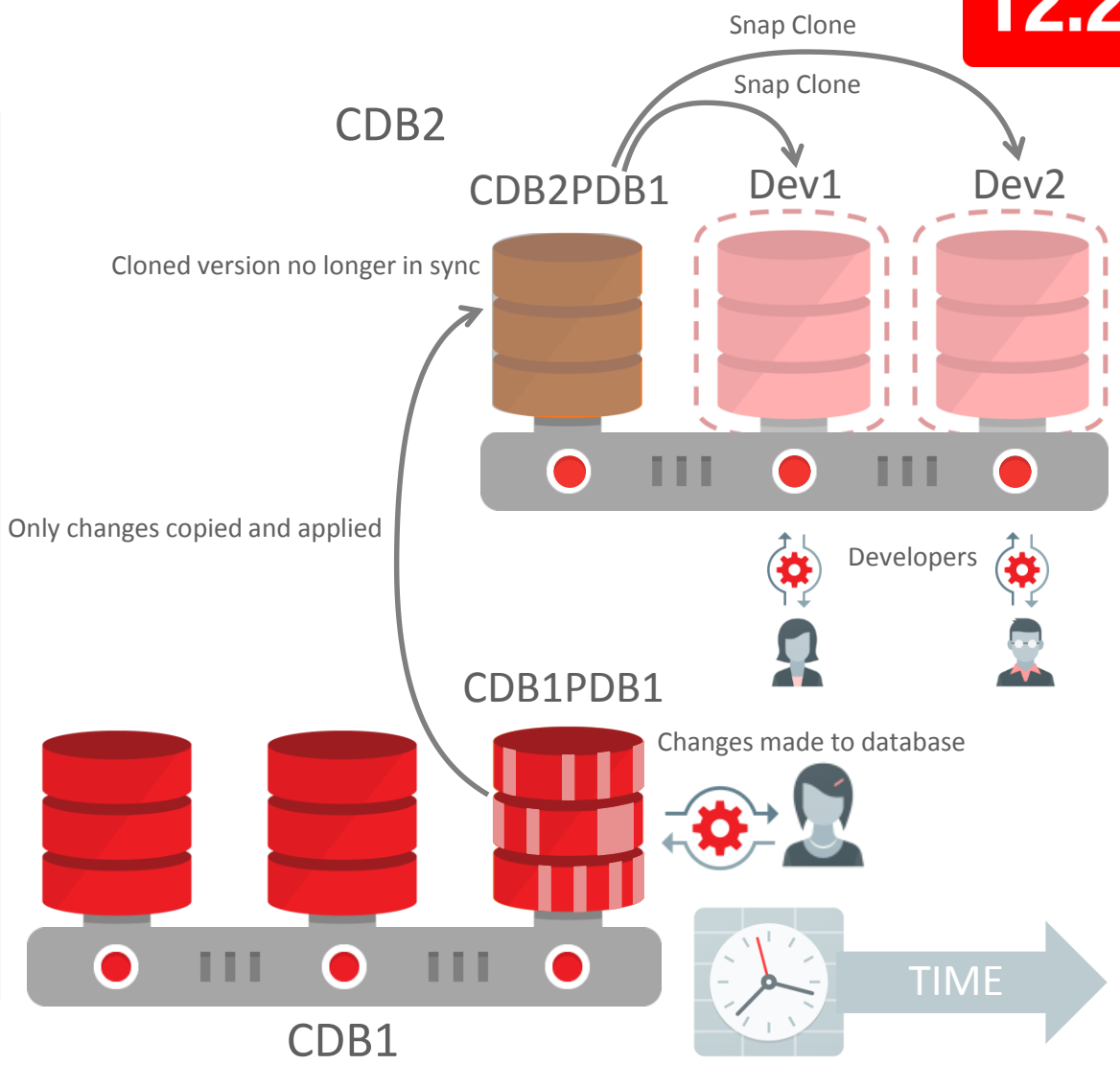
- PDB Hot Clone
  - Online test master instantiation



PDB Refresh

NEW IN 12.2

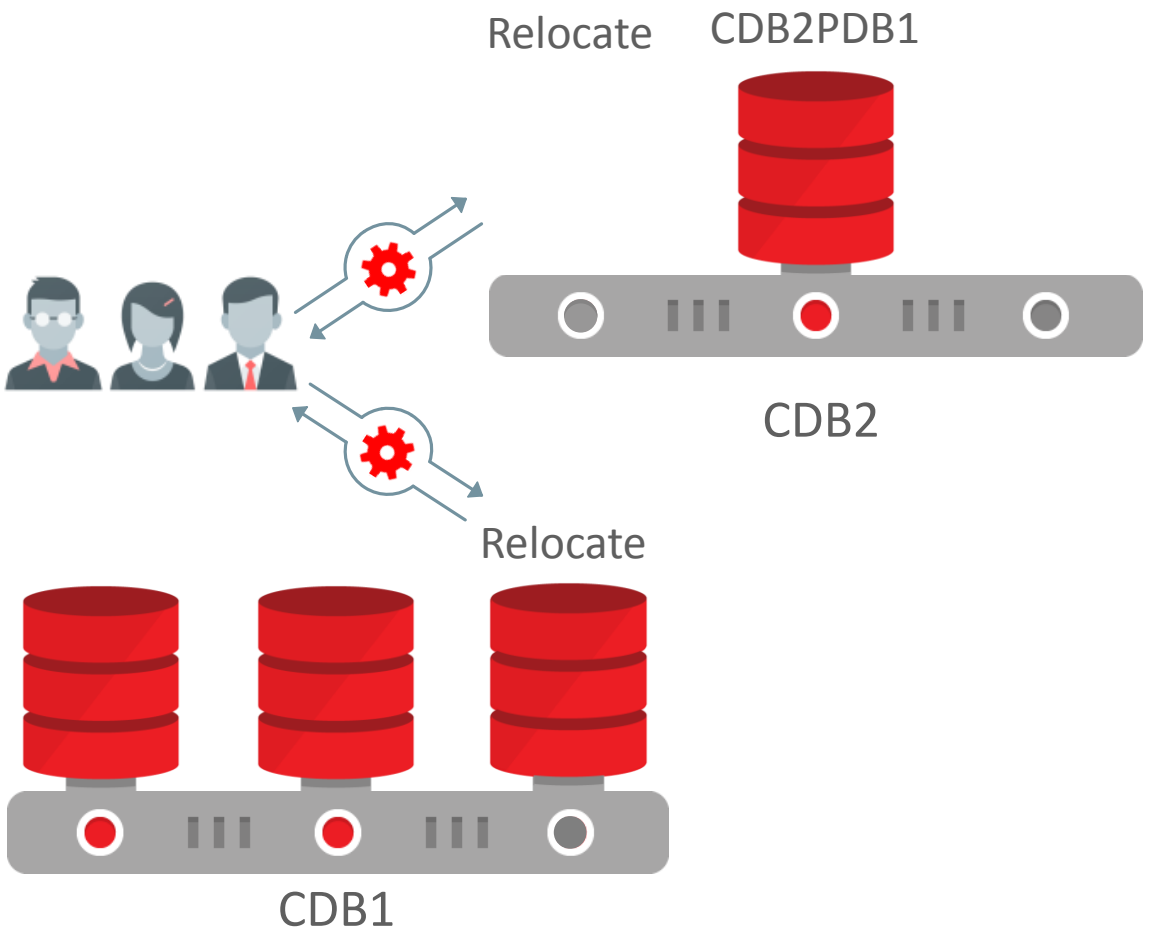
- PDB Hot Clone
  - Online test master instantiation
- PDB Refresh
  - Incremental refresh of clone with latest data



PDB Relocate

NEW IN 12.2

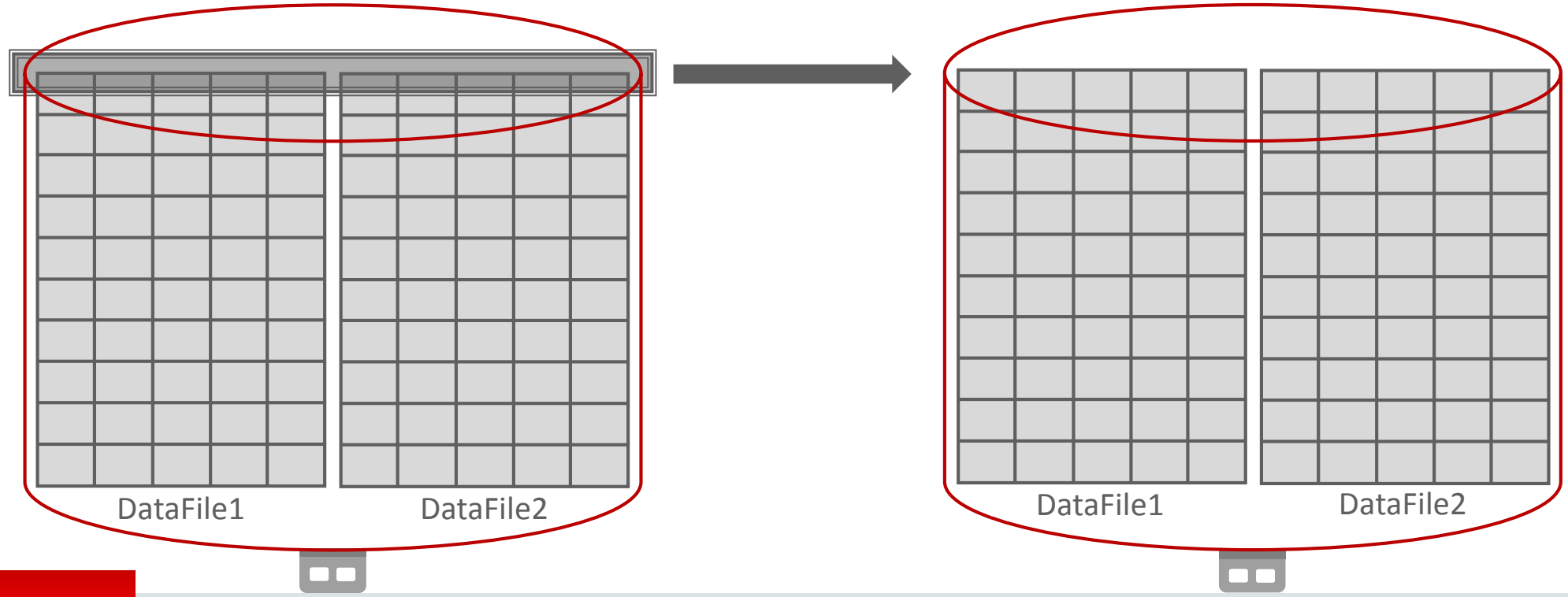
- PDB Hot Clone
  - Online test master instantiation
- PDB Refresh
  - Incremental refresh of clone with latest data
- PDB Relocate
  - Relocate with no downtime



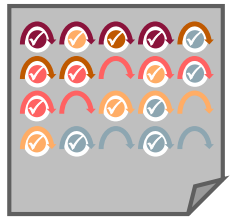
Cold Clone

12.1 capability requires outage in source PDB

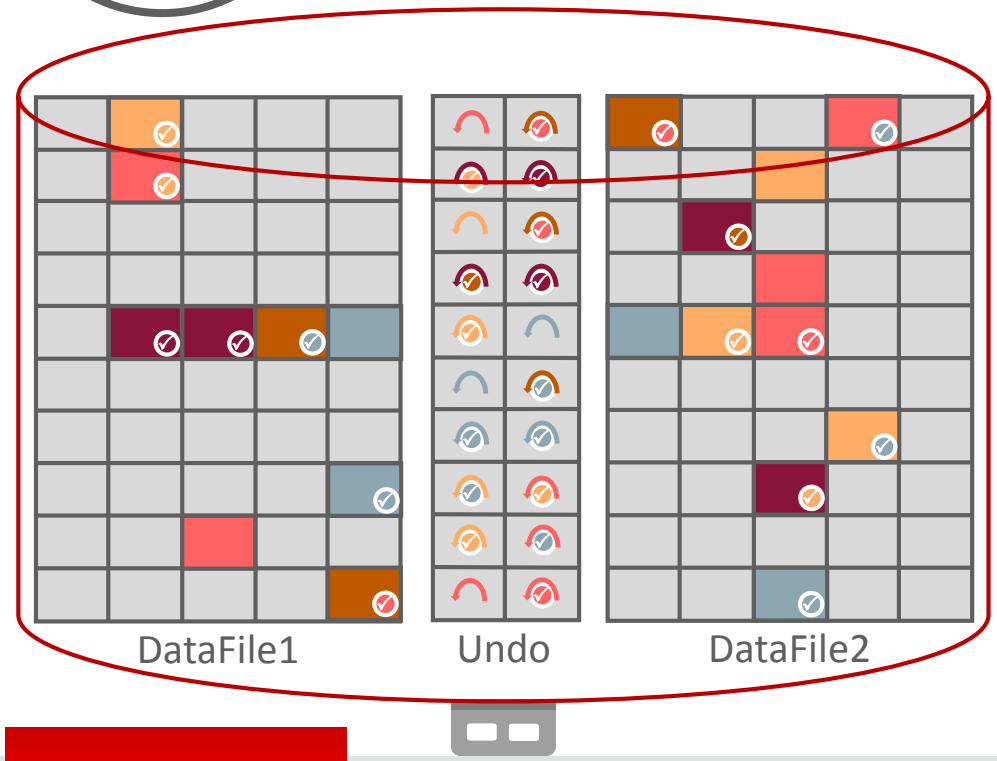
- Source PDB transitions to read-only
- Read and copy in parallel
- Open source database read-write when complete



Modeling Database Changes Over Time

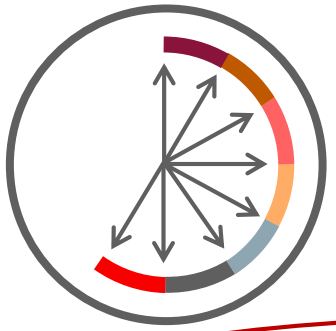


Redo Log



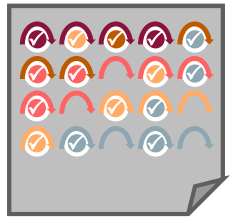
	Legend
	Uncommitted block changed in interval
	Block changed in interval Committed in interval
	Uncommitted redo
	Undo written in interval Committed in interval

Hot Clone

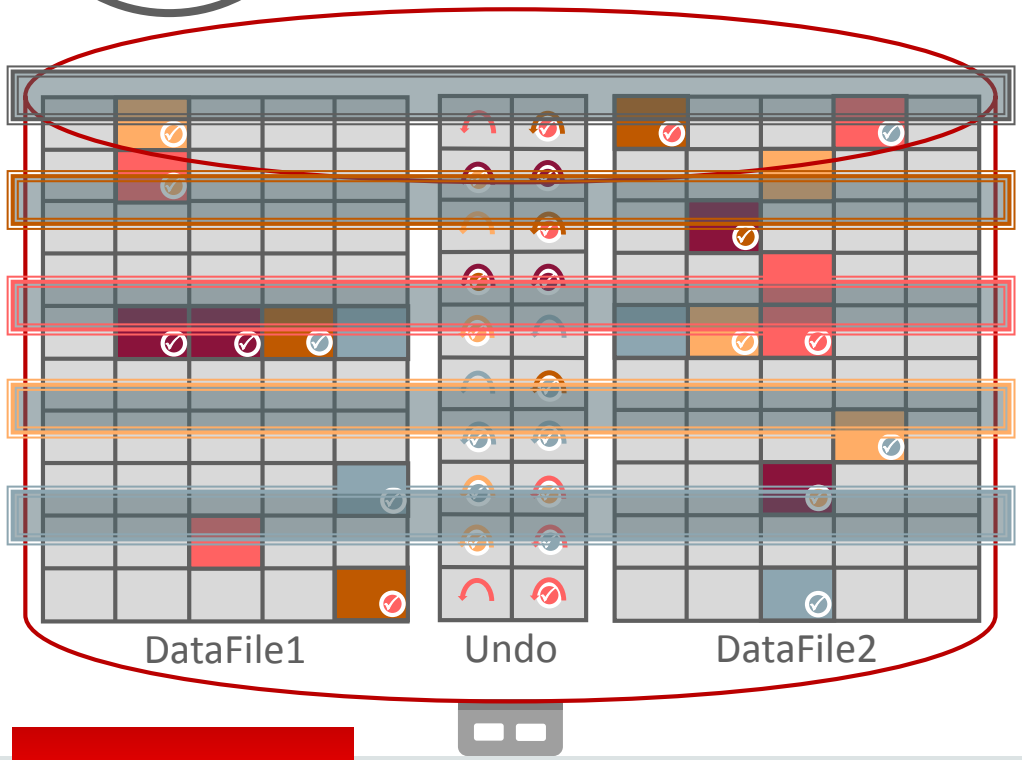


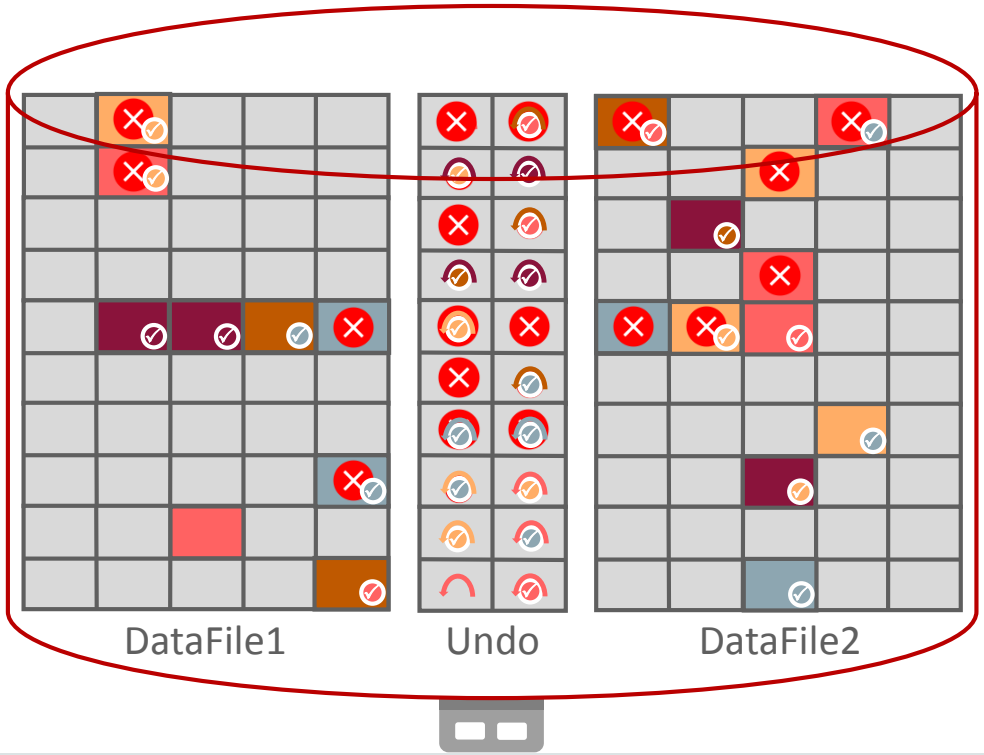
- Source PDB remains open read/write
- Read and copy in parallel
- On-going operations imply a “dirty read”
- Some data changes not included in initial file copy
- Ship and apply redo to catch up with source
- Apply undo to rollback uncommitted transactions

NEW IN 12.2



Redo Log





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