

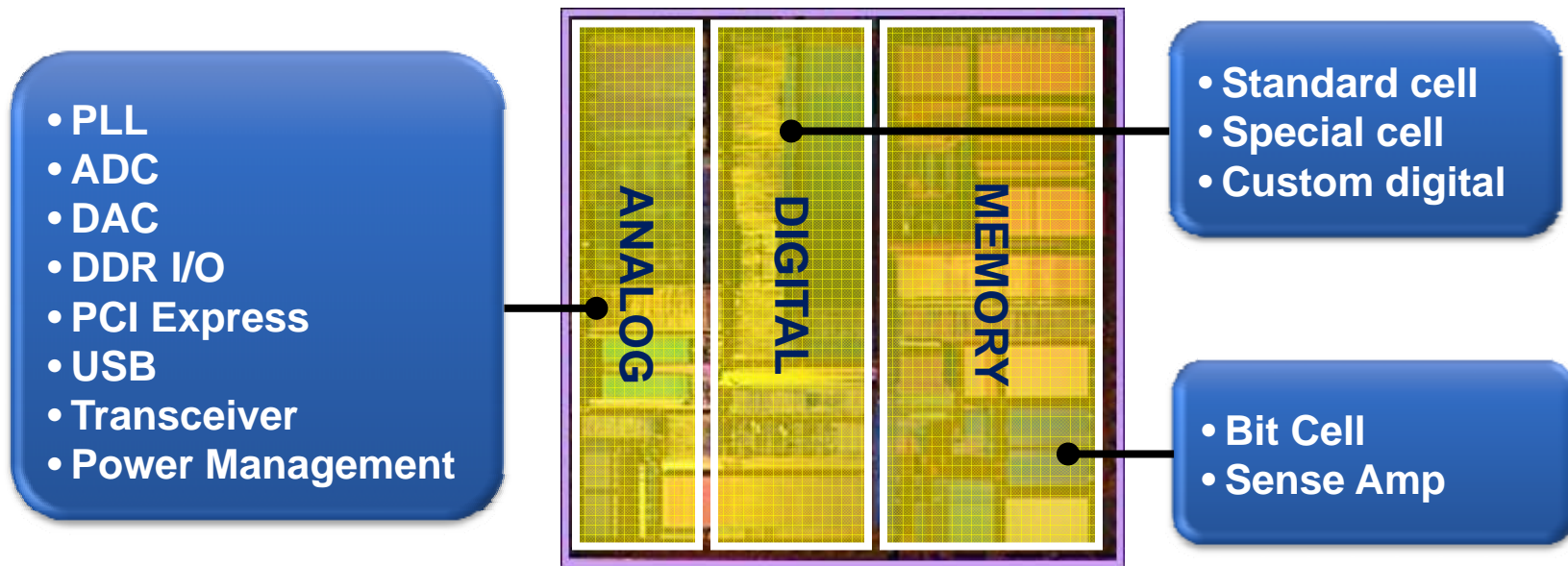
Synopsys Interoperability Breakfast

**Raiders of the Locked Art: Opening the Treasure with
Interoperable PDKs**

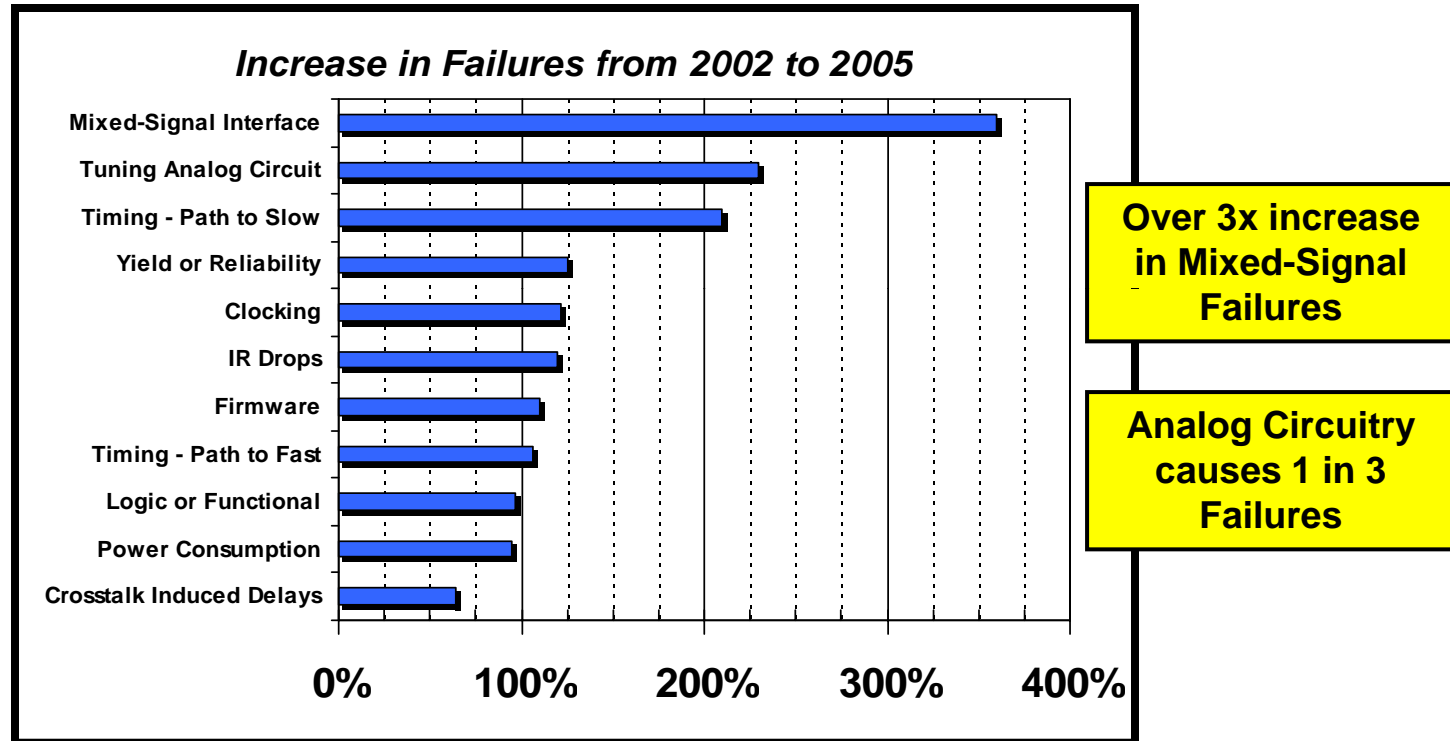
Paul Lo

Sr VP & GM Analog Mixed-Signal Group

Analog is Everywhere



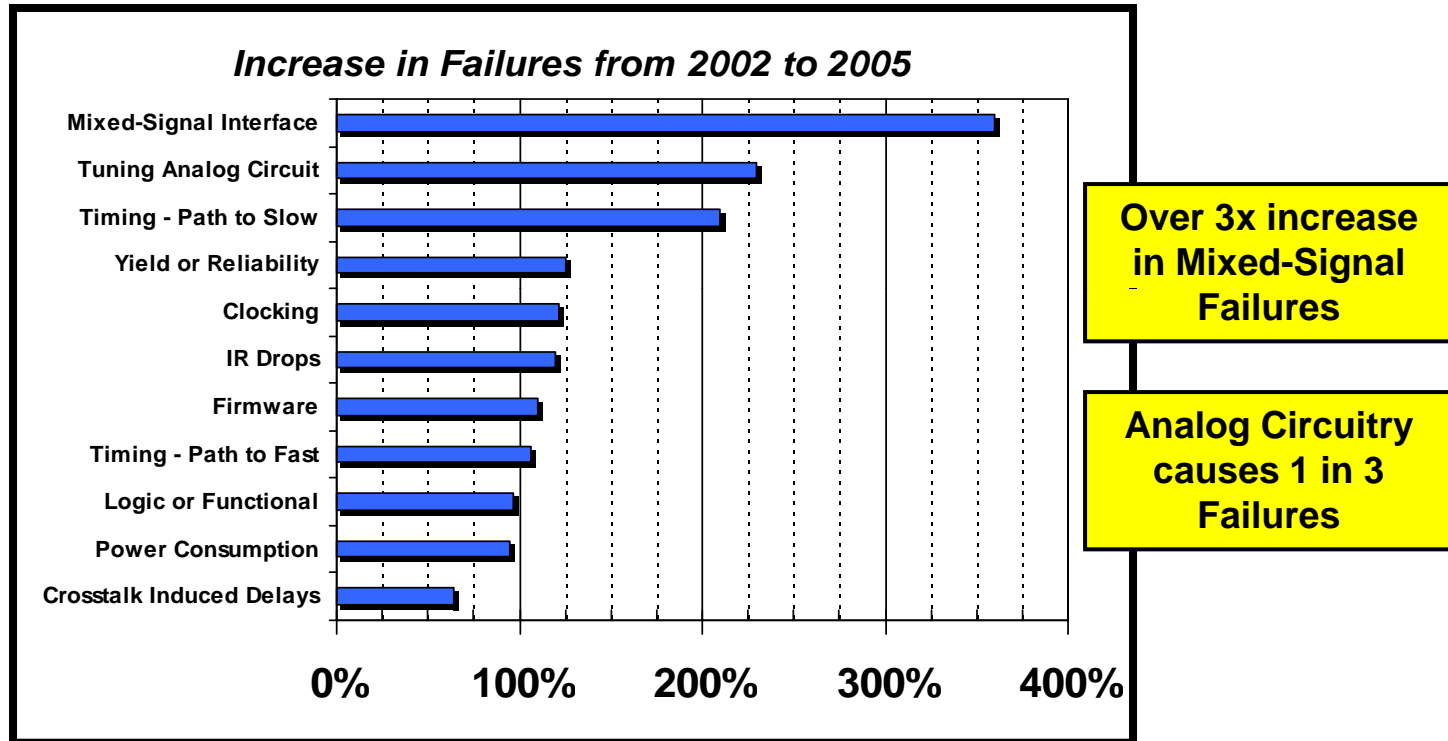
Customers are Clamoring for Improvements in Analog EDA



And Yet....

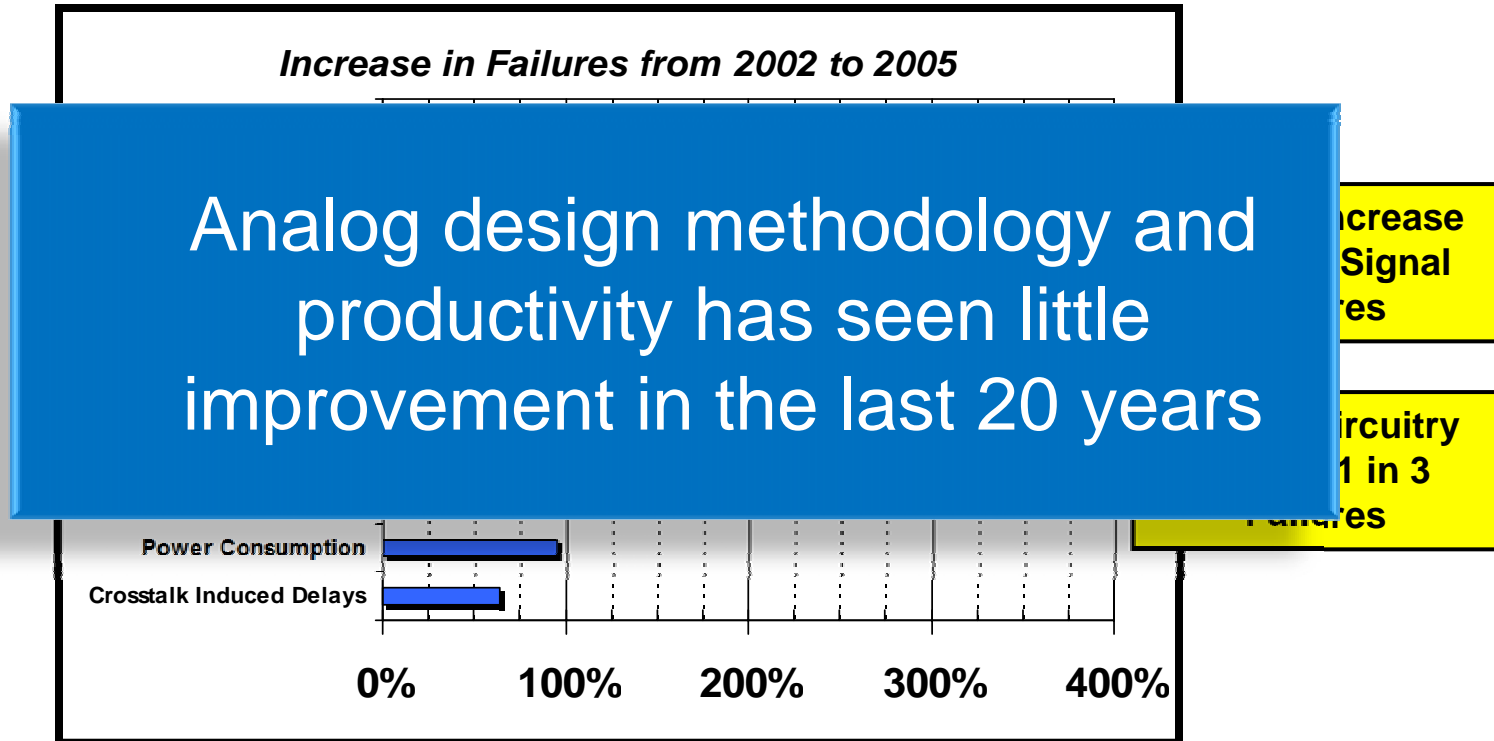
Source: Collett Functional Verification Study 2002, 2004 and Collett Design Closure Study 2005

Customers are Clamoring for Improvements in Analog EDA



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Customers are Clamoring for Improvements in Analog EDA



Is Analog EDA an Oxymoron?

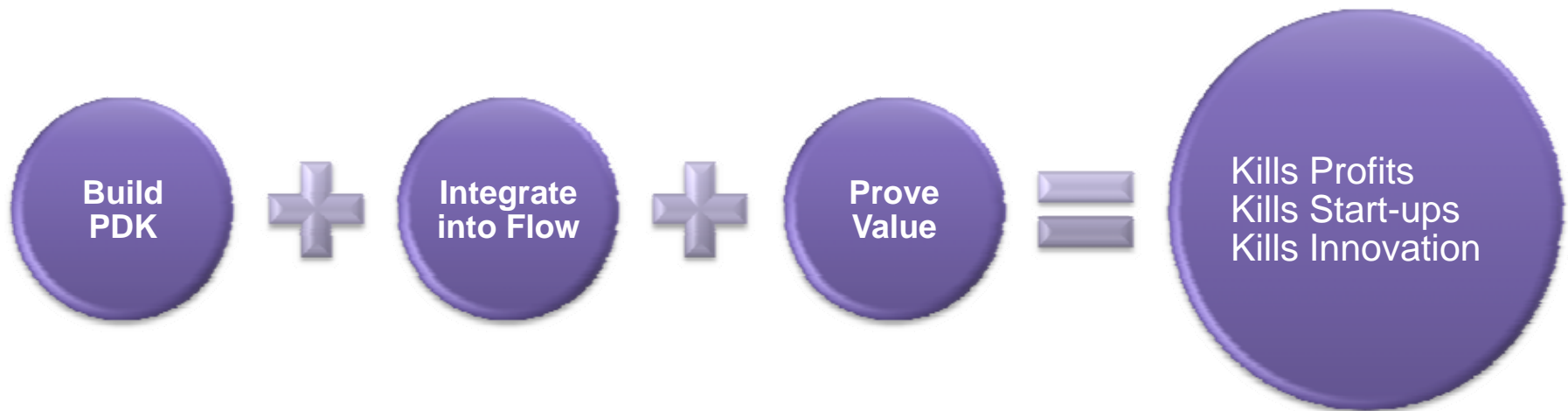
Source: Collett Functional Verification Study 2002, 2004 and Collett Design Closure Study 2005

EDA Vendor Challenges

- Talent is Sparse
 - Analog is multi-faceted and highly specialized
- Money is Sparse
 - Continual pressure to lower CAD budget
- Risk taking is Sparse
 - Analog engineers are risk adverse
- And...

The Biggest Challenge in Analog EDA

Lengthy and resource intensive evaluation cycles



The Hurdles to Success are High

Standards Can Reduce Barriers

- Step 1: PDK standards
 - Enable one PDK to work with many EDA Vendor tools
 - Reduce PDK development, support and deployment costs
 - *Enable easier new tool evaluation & deployment*
- Step 2: Database and Flow standards
 - Enable easier new tool integration
 - Promotes tool interoperability
 - *Enable easier new tool evaluation & deployment*

Synopsys' Approach to the Solution

- Interoperable PDK Library (IPL) Alliance
 - Founding member and key contributor
- OpenAccess for Interoperability
 - OA support for Hercules, Star-RCXT and custom design solution
 - Si2 OaViewer donation

Through collaboration, the industry can solve the analog productivity log jam

Thank You