Planting the Future
Cutting-Edge OCP Products and Partnerships

Ethan SL Yang/Deputy Manager/Wiwynn
Planting The Future

What’s the NEWs in 2017 from Wiwynn?

- Accelerate Knowledge, Accelerate Compute
- Lightning Fast Comes To The 19” World
- Intel® RSD on OCP (Optimized Pooling, Scaling & Utilization)
- 48V Direct to PoL VRs for CPU and Memory

Successful Case Study

- Accelerating OCP Migration
Accelerate Knowledge, Accelerate Compute

Dr. Know (19” 3U16Bay JBOX) in Workshop

- High performance compute accelerator
- New EIA 19” 3U16Bay with 16 GPGPUs
- Higher application flexibility (AI & Machine/Deep Learning)
- Easy tool-less design (GPU cards, fan modules, PSUs)
Lightning Fast Comes to The 19” World

Thunder (19” 1U All-Flash NVMe JBOF) in Workshop

- Offer data center operators benefits of OCP Lightning
- 24 hot-pluggable U.2 NVMe SSDs in 1U space
- 26GB/s throughput with 5,692K IOPS
- Easy tool-less design
- 2 PCIe 3.0 x16 connections directly to servers
RSD on OCP (Optimized Pooling, Scaling & Utilization)

Wiwynn’s Latest Pooling Solution in Live Demo (Booth B3)

- Advancing software-defined data center modularization
  Compute Pool, NVMe Pool, Storage Brick and SDN Fabric

- Includes world’s First NVMe SSD JBOF (ST7200-30P)

- Intel® RSD on OCP transforms leading-edge Wiwynn hardware into logical resource pools
48V Direct to CPU Goes Mainstream

Wiwynn’s 48V Server in Live Demo (Booth B3)

- Based on OCS full width blade specification
- Vicor 48V direct to PoL VRs for CPU and Memory
- Support integrated PSU or blind-mate bus bars
Successful Case Study
Accelerating OCP Migration

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Accelerating OCP Migration

Customer’s First Migration to OCP

- Wiwynn successfully helps customer perform its first migration to OCP
- Strengthen cost competitiveness corresponding to Large-Scale Data Centers
- Further improve base technological capabilities
Proven at Hyper scale
Proven at Hyper scale

1. Simple
2. Ecosystem
3. Innovation
1. Simple – User Centric

- Tool Less Maintenance
- Front Access
- Operation @ Scale
- No Human Error
- One hand carry
- Stability
2. Ecosystem – Open & Mature

- Today
  - Box Level

- Open Compute
  - Part Level

More Saving
2. Ecosystem – Open & Mature

Spec

OEM A
Model X
Parts

OEM B
Model Y
Parts

Different Policy
(QA, Speed, Disclosure)

Different Serviceability

Different Choices in Parts

Long time to solve issues
Overhead in Ops
Tons of spare servers

Inefficiency in Ops
2. Ecosystem – Open & Mature

Spec → Design → Build & QA → Parts → Parts

Common **Serviceability**

Consolidated **Policy** (QA, Speed, Disclosure)

Standardized **Parts**

- **Easy Ops**
- **Transparency**
- **Less spares**

**Efficiency in Ops**
2. Ecosystem – Open & Mature
3. Innovation – w/ Reliability

Hardened Quality  Innovation
Things to Consider & Challenge

- **Apps : Does an app need to be resilient?**
  
  Better.
  
  Scale-out services like Web server, Distributed DB, Hadoop, Object Storage...the best fits.

- **Data Center : Do I have to have my own data center?**
  
  Better but not required. because you need to bring OpenRack in.
  
  OpenRack is the same external dimension as a 19” rack.
  
  New ideas underway.

- **Volume : How many servers do I need to buy to get a cost benefit?**
  
  More is better, then you will benefit from the parts pricing.
  
  Cost of Rack, Power Shelf and establishing new QA process would be relatively high when you buy small.
  
  New ideas underway.
Growing The Future of OCP with Our Partners

Wiwynn Partner List

- http://www.wiwynn.com
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The Tale Continues: OCP, Wiwynn, and Partners

- Together, Wiwynn and Partners will accelerate the future of OCP technologies and migration
Thank you