Newegg Cloud Computing with OpenStack + Ceph

By Jason Chan
General Manager, Newegg Taiwan

Newegg Business Pillars

eCommerce

Global EC Outsourcing

Cloud Computing Products and Services

Challenges and Issues

- Time to market

- Large scale of cloud computing infrastructures and platforms

- Flexibility and scalability

- Reliability and manageability。

- Rapid deployment

- Highly customizable to meet diversified need

- Total cost of ownership

Previous Status

- A pilot project on AWS with 140+ VM instances

- Proprietarized by AWS S3、RDS、DynamoDB、CloudSearch、SQS…

- MUST strictly follow Amazon Web Services guidelines and development disciplines

- Increasing cost and expenditure on infrastructure and VM environment

Goals

- To build up Newegg Clouds and co-located in Taiwan

- To manage cost and effectiveness

- In-house development of desired products, services and software

- Scalable S/W, H/W and infrastructure

- To sustain high availability and flexibility

- To provide state-of-art Cloud Computing products and Services

Milestones and Achievement

- 14 days to install racks, servers, routers, switches and corresponding systems

- 13 days to deploy Newegg's VM and S/W development, testing and staging environment

- The first and largest operator grade OpenStack+Ceph using community codes in Taiwan

- Providing Cloud storage up to 3 PB

- Capable of offering 4800 VCPU，4TB RAM VM

Benefit and Advantage

- ✓ System performance 50% improvement
- ✓ Web sites response time 60% improvement。
- ✓ Cost reduction on Infrastructure by 73%
- ✓ VM cost reduction by 100%

Next Steps

- Becoming the largest EC and Cloud vendor based on OpenStack in Taiwan 。

- Providing professional services to enable more OpenStack in Taiwan's commercial environment

- To enrich the OpenStack community and create more services and applications

More references

- **Walmart電商3.0新戰略關鍵：打造全球最大OpenStack私有雲**
  - http://www.ithome.com.tw/news/104609

- **日本雅虎用OpenStack打造5萬台VM**
  - http://www.ithome.com.tw/news/98304

- **Google加入OpenStack陣營**
  - http://www.ithome.com.tw/news/97472

Thank you!