

Kaloôm™ is a distributed data center networking software company headquartered in Montreal with an experienced management team that has delivered many successful products, grown revenue and built successful companies. We have developed an innovative, fully containerized Data Center and Edge Networking software solution built on Programmability, Automation and Open standards to run on a new generation of standards-based open networking, white box switches and servers. The approach enables our customers (Telco, Data Center and Cloud Services Provider) to reduce vendor lock-in, develop and deliver applications faster while drastically reducing the cost.

Technology and Initial Use Case: Kaloôm's embedded 5G User Plane Function (UPF) is built on its foundational Cloud Edge Fabric™ product. The solution provides a factor of 10x in throughput, 100x in lower latency at 1/10th the cost per Gbps than any incumbent vendor. As a result, Kaloôm is experiencing tremendous traction from the largest telecom and data center operators worldwide in its development and delivery of the first container-based software networking fabric with integrated switching and routing. The solution allows emerging applications to be delivered in a cost-effective and scalable fashion. The company and its solutions have been considered to be among the top 12 telecom disruptors of 2019 by a telecom industry trade publication.

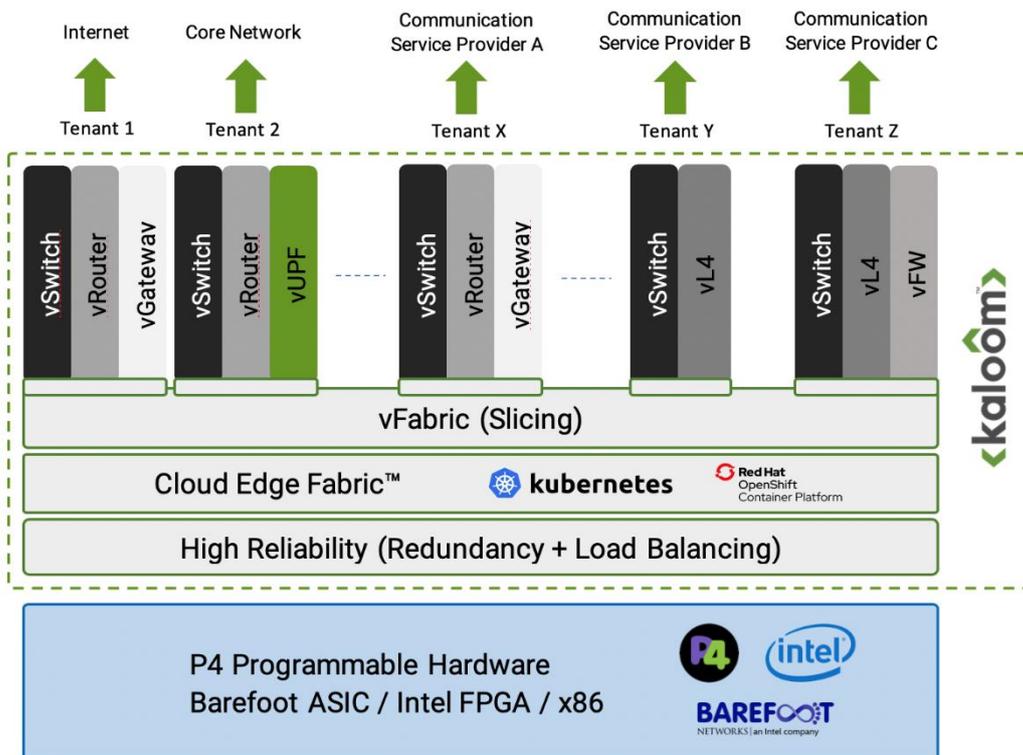


Figure 1 - High-Level Block Diagram

Market Size, Trends and Drivers: Before the end of this decade, over 50B devices will be connected to the Internet and served by Cloud Native Applications running within a range of different sized data centers; hyperscale to edge data centers.

5G, AI, Cloud, and Edge computing are the fundamental building blocks for a suite of emerging applications such as:

- Interactive Gaming
- Augmented Reality
- Virtual Reality
- Remote Medicine
- Connected Cars
- Smart Cities
- Smart Buildings
- Industrial IoT

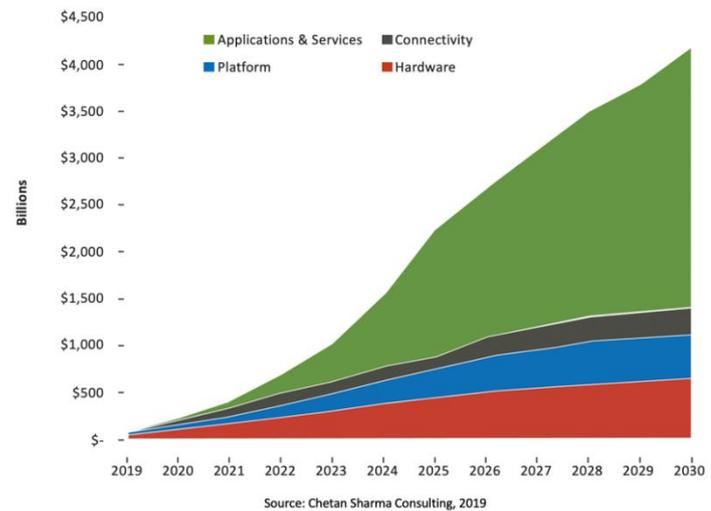


Figure 2 - Edge Internet Economy - Growth Moves to Application Services

Industry Problems Addressed: Unfortunately, the existing IT infrastructure is unable to scale and is inadequate in its ability to sustain new applications and devices in an environmentally friendly and business-viable fashion. In today's world, IT infrastructure is still siloed and while servers and storage have advanced, networking remains far behind from a virtualization perspective, resulting in much slower responsiveness to the application needs of internal and external customers. IT infrastructure is also responsible for 4% of the total greenhouse gas emissions. Without more power-efficient solutions, it is expected that these new applications will cause the associated amount of GHG to double by 2028.

Kaloom's Differentiators and Value Proposition: Cloud and Edge computing requires compute, storage, and networking solutions. Kaloom provides a highly advanced and modern cloud networking solution which integrates well with the entire infrastructure in allowing service providers to accelerate time to deliver new emerging applications and market new services. The key differentiators introduced by Kaloom's solution are as follows:

- A fully automated solution with automatic software installs and updates, and self-configuring network capabilities.
- A fully programmable environment where both control plane and data plane functions can be added or modified in software without the need to replace already deployed hardware.
- A system which supports slicing, meaning that we can virtualize the data center itself by partitioning a physical data center infrastructure into multiple independent virtual data centers.
- A solution which radically reduces the latency by a factor of up to 7x while increasing the throughput per server by a factor of 2x.
- An optimized solution integrated with OpenStack, Kubernetes, and OpenShift providing support for today's virtual machine (VNF) based infrastructures, as well as emerging container (CNF) based workloads.
- Support for specialized edge HW configurations having space and power constraints enabling a major reduction in power consumption.