

CPT91

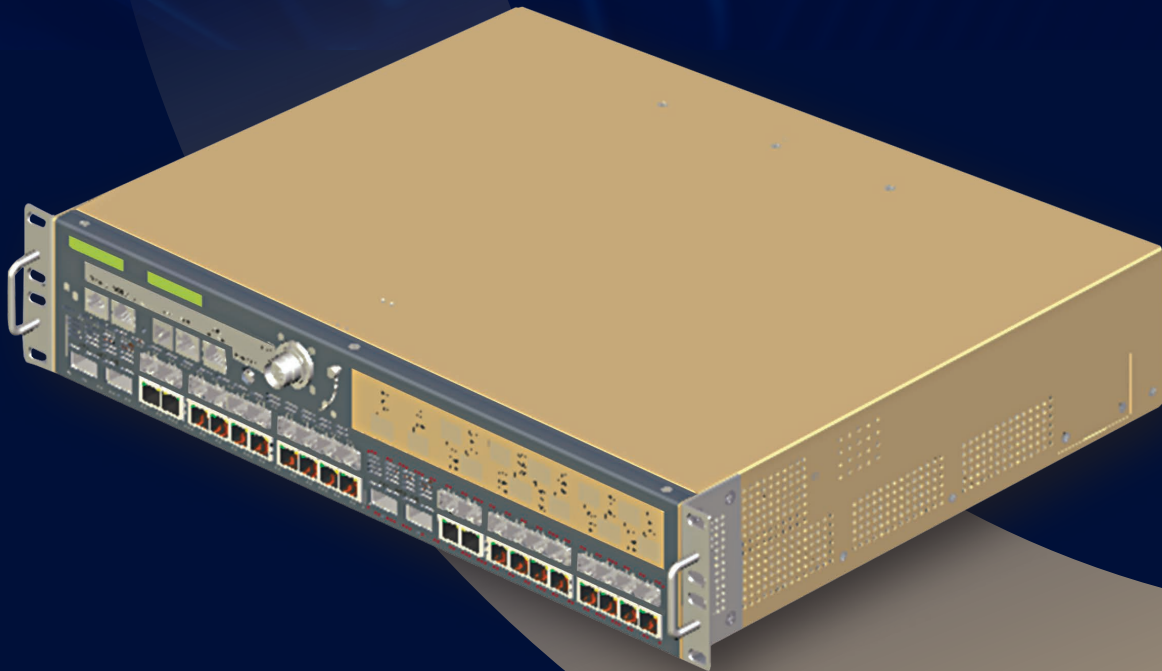
ReCRYPT

Secure National Encryption Platform

ReCRYPT is a Czech-developed OEM platform offering proprietary encryption algorithms with full national ownership and supply chain control. It features line-rate throughput exceeding 100 Gbps, deep packet inspection, and complete RED/BLACK network separation for secure classified information transport. Fully interoperable with commercial equipment, it enables flexible deployment over leased infrastructures while providing multi-layer protection.

KEY BENEFITS:

- Full control over production, logistics, and encryption to prevent hardware threats and supply chain attacks.
- Proprietary secure encryption for classified information transport.
- Interoperable with commercial network equipment and leased infrastructures.
- Scalable for speeds up to 100Gbps; agnostic to links (SDH, PTN, Ethernet) and protocols (IP, MPLS).
- Open architecture with API for custom applications and big data integration.



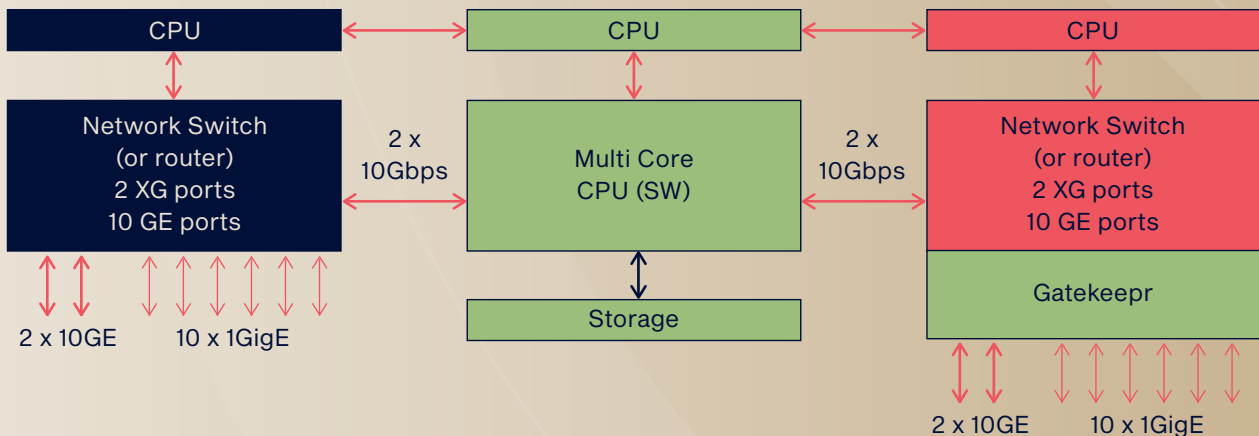
ENCRYPTION PLATFORM

- Multi purpose networking and security OEM platform
- Enable customer customization and development of unique and classified secure networking applications
- Targeted for: Network security, Secure communications, Network filtering, Monitoring and Encryption applications
- Support line rates of > 100Gbps
- Provides secure HW , Full L2-4 BiNOX networking SW
- Flexible HW architecture enables customer embedding their unique applications in the form of:
 - Firmware - FPGA implementation, supports 100Gbps throughput
 - SW - Multi core CPU engine
- Full separation between internal and external networks (Black and Red separation)

KEY FEATURES

- 2 x 10GE + 10x1GigE ports on internal (RED) and external (BLACK) sides
- GateKeeper Programmable HW at the Internal network (RED) input enables packet filtering before entering the appliance :
 - Line rate filtering (FPGA based)
 - Can provide full separation on ports in internal network to prevent any possibility of package leakage.
 - SW and Firmware API to support customer application
- Dedicated CPU to support customer application management
- Two separated 10GE Ethernet switches on the Internal and External Network:
 - Full Duplex Wire Speed Switching on all ports
 - Dedicated CPU per Switch for Management
 - BiNOX SW networking Stack - L2-4 Switching and Routing environment
- AC & DC Redundant and Pluggable Power supplies

ENCRYPTION PLATFORM – BLOCK DIAGRAM



CATEGORY

FEATURES

CATEGORY	FEATURES
Synchronization	CES, SyncE and 1588v2
Ethernet	VLANs, STP, RSTP, MSTP, LACP, IGMPv3, etc.
Routing	RIP, OSPF (TE), IS-IS (TE), BGP, VRRP, PIM, VRF, etc.
QoS	VPT/DSCP mapping/remarking, Rate limiting, ingress/egress shaping/queuing, Multi-level hierarchy (Hierarchical QoS), etc.
MPLS	RSVP-TE (FRR 1:1 and FRR 1:N), LDP, T-LDP
VPLS	VPWS, VPLS, H-VPLS (both PE-rs and MTU-s)
Resiliency	Resilient Links, Port Trunking/Link Aggregation, MSTP (<50ms), G.8031/G.8032, MPLS FRR, Secondary PW, etc.
OAM	IEEE 802.3ah (EFM), IEEE 802.1ag (CFM), ITU-T Y.1731, IETF MPLS Ping & TraceRoute, IETF VCCV (PW OAM), IETF Throughput/Test-Head (RFC2544), Network Performance (Y.1564)
Security	ACL, RADIUS, SSHv2, 802.1x, SNMPv3, SFTP, etc.
Management	CLI, Telnet, SSH, FTP/TFTP/SFTP, RMON, Java™-GUI, SNMP v1/v2c/v3, DHCP Server & CLIENT, etc.
Services	E-Line, E-LAN, E-Tree, E-Access (MEF 6.1, MEF 9, MEF 10.1, MEF 14), CE 2.0 certified
Load Balancing	Improves traffic distribution, Flexible selection of header fields, Various hashing/mapping
DPI	Full session reconstruction, Filtering, Redirection, Metadata, Statistics