MTCINE training outline

Course prerequisites – MTCNA and MTCRE certificates

Title	Objective
BGP	- What is Autonomous System - What is BGP? - Path Vector algorithm - BGP Transport and packet types - iBGP and eBGP + **LAB** - Stub network scenarios and private AS removal + **LAB** - Non-stub scenarios + **LAB** - iBGP and eBGP multihop and loopback usage + **LAB** - Route distribution and routing filters +**LAB** - BGP best path selection algorithm - BGP prefix attributes and their usage + **LAB** - BGP route reflectors and confederations + **LAB**
MPLS	- What is MPLS (basics) - Static Label Mapping + **LAB** - Label Distribution (LDP) + **LAB** - What is Penultimate-hop-popping - MPLS traceroute differences - LDP based VPLS tunnels + **LAB** - What is Bridge Split Horizon + **LAB** - VPLS Control Word (CW) usage - L2MTU importance and MPLS fragmentation - BGP based VPLS + **LAB** - VRF and route leaking + **LAB** - L3VPN (BGP based Layer3 tunnels) + **LAB** - OSPF as CE-PE protocol
Traffic Engineering	- What is traffic engineering and how it works - RSVP, Static path, dynamic path (CSPF) + **LAB** - Bandwidth allocation and bandwidth limitation differences and settings + **LAB**