

1. Record Nr.	UNINA9910453958803321
Autore	Alcatel-Lucent
Titolo	Versatile Routing and Services with BGP [[electronic resource]] : Understanding and Implementing BGP in SR-OS
Pubbl/distr/stampa	Hoboken, : Wiley, 2014
ISBN	1-118-87521-4
Descrizione fisica	1 online resource (362 p.)
Altri autori (Persone)	BookhamColin
Disciplina	004.6
Soggetti	BGP (Computer network protocol) Computer network protocols Internet Electrical & Computer Engineering Engineering & Applied Sciences Telecommunications Electronic books.
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Description based upon print version of record.
Nota di contenuto	Cover; Title Page; Copyright; Contents; Chapter 1 Getting Started; Session Negotiation and Capabilities; UPDATE Messages; NOTIFICATION Messages; Multi-Protocol BGP; Chapter 2 BGP/MPLS IP-VPN; Basic Configuration; Prefix Dissemination; Automatic Route Filtering; Route Refresh; Outbound Route Filtering; Soft Reconfiguration; Route Target Constraint; Extensions for IPv6 VPN (6VPE); Core Requirements; PE to CE BGP Peering; Multi-AS Backbones (Inter-AS); Chapter 3 Using BGP in VPLS; BGP Auto-Discovery with LDP Signaling; BGP Auto-Discovery and Signaling; BGP Multi-Homing Chapter 4 BGP Signaling for VPWSBGP VPWS; Single-Homed VPWS; Multi-Homed VPWS; Dynamic Multi-Segment Pseudowire; Chapter 5 Labeled Unicast IPv4; Seamless MPLS; Transport Layer; Service Layer; Inter-AS Type C; Carriers' Carrier; Notes; Chapter 6 Reconvergence; Advertisement of Multiple Paths; Best External; Next-Hop Tracking; Prefix Independent Convergence (PIC); Core PIC; Edge PIC; Minimum Route Advertisement Interval; BGP Anycast; Chapter 7 Multicast; Inter-Domain IPv4-IPv6 PIM; Multicast in MPLS/BGP IP-VPNs; Draft-Rosen;

Multicast VPN; Chapter 8 Graceful Restart and Error Handling
Graceful Restart Mechanism Error Handling; Chapter 9 Security;
FlowSpec; Attack Mitigation with Blackhole Action; Attack Mitigation
with Redirect to VRF Action; Remote Triggered Blackholing; Generalized
TTL Security Mechanism; Auto-Generation of Filters for BGP Peers;
Chapter 10 General Applicability; IPv6 PE Router (6PE); Load-Balancing;
IBGP-Multipath; Multipath; EIBGP Multipath; IGP Shortcuts; Split
Horizon; Peer Groups; BGP in Residential Broadband Networks; QoS
Policy Propagation Using BGP; Route Policy Framework; Basic Path
Attribute Manipulation; Nested Policies (Next-Policy)
Subroutines Notes; Chapter 11 Looking Ahead; Ethernet VPN (EVPN);
Ethernet Auto-Discovery Route; MAC Advertisement Route; Inclusive
Multicast Ethernet Tag Route; Ethernet Segment Route; IP Prefix
Advertisement Route; Multi-Homing Mode; Control-Plane-Only Route-
Reflection; Virtual Route-Reflector; Optimal Route Reflection (ORR);
Prefix Origin Validation; Link State Information Distribution Using BGP;
Appendix A Path Selection Process; Best-Path Selection Algorithm;
Always-Compare-MED; Deterministic MED; References and Glossary;
Index

Sommario/riassunto

Design a robust BGP control plane within a secure, scalable network for smoother services A robust Border Gateway Protocol setup is vital to ensuring reliable connectivity, an essential capability for any organization. The Internet has become a necessary, always-on service in homes and businesses, and BGP is the protocol that keeps communication flowing. But BGP also has become crucial to delivery of intra-domain business services. But the network is only as reliable as BGP, so service enablement depends upon making BGP more stable, reliable, and service-rich. Alcatel-Lucent Service
