# z/OS V1R13

## BCP GRS: New authorized qnames

### Overview

- Problem Statement / Need Addressed
  - Authorized programs using unauthorized Qnames are vulnerable to denial-of-service: any program can own the resource
  - HSM has been using several unauthorized Qnames
  - It was problematic for HSM to migrate to different Qnames
- Solution
- GRS is providing a migration path to a larger authorized Qname list
- Benefit / Value
  - Improved resiliency for HSM

#### Usage and invocation

- GRSCNFxx now supports AUTHQLVL
  - Default value of 1: the prior authorized Qname list
- AUTHQLVL of 2 includes these additional Qnames:
  - ARCBACV
  - ARCBTAPE
  - ARCDSN
  - ARCGPA
  - ARCMIGV
- D GRS, STATUS includes AUTHQLVL in the output
- SETGRS AUTHQLVL can dynamically fall back to level 1
  - It cannot be used to increase the level
  - Intended as a safe-guard in case of ISV program issues

#### Interactions and dependencies

#### None

#### Migration and coexistence considerations

- Potential impact with ISVs
  - Some ISV programs may interact with HSM ENQs
  - Unauthorized programs will ABEND338 on ENQ, ABEND330 on DEQ
  - These ISV programs need to become authorized
- EQDQ Monitor enhanced to aid migration
  - New filter: REQTYPE=AUTHQ2
  - Detects unauthorized requesters against the new Qnames
- Rolling IPL can be used
- Authorization check in effect for a given system
- New Health check: GRS\_AUTHQLVL\_SETTING
  - Installations recommended to use AUTHQLVL 2
  - Maximum protection for authorized ENQ users
  - Check can be overridden

#### Installation

None

#### **Appendix - References**

- z/OS V1R13.0 MVS Planning: Global Resource Serialization
- Document Number SA22-7600-xx
- z/OS V1R13.0 MVS System Codes – Document Number: SA22-7626-xx
- z/OS V1R13.0 MVS System Commands – Document Number SA22-7627-xx
- z/OS V1R13.0 MVS System Messages, Vol 9 (IGF-IWM) – Document Number: SA22-7639-xx