

COURSE: SECURITY+ SY0-401

MODULE 5: ACCESS CONTROL AND IDENTITY MANAGEMENT

Overview



- Explain the importance of application security controls and techniques
- Compare and contrast the function and purpose of authentication services
- Given a scenario, select the appropriate authentication, authorization or access control
- Install and configure security controls when performing account management, based on best practices

Authentication Services



- RADIUS
- TACACS+
- Kerberos
- LDAP
- XTACACS
- · SAML
- Secure LDAP



and Access



- Identification vs. authentication vs. authorization
- Authorization
 - Least privilege
 - Separation of duties
 - ACLs
 - Mandatory access
 - Discretionary access
 - Rule-based access control
 - Role-based access control
 - Time of day restrictions

and Access



- Authentication
 - Tokens
 - Common access card
 - Smart card
 - Multifactor authentication
 - TOTP
 - HOTP
 - CHAP
 - PAP
 - Single sign-on
 - Access control
 - Implicit deny
 - Trusted OS



and Access



- Authentication factors
 - Something you are
 - Something you have
 - Something you know
 - Somewhere you are
 - Something you do
- Identification
 - Biometrics
 - Personal identification verification card
 - Username
- Federation
- Transitive trust/authentication



Account Management



- Mitigate issues associated with users with multiple account/roles and/or shared accounts
- Account policy enforcement
 - Credential management
 - Group policy
 - Password complexity
 - Expiration
 - Recovery
 - Disablement Local Policies
 - Lockout



Policy 🛆	Security Setting
Enforce password history	O passwords remem
Maximum password age	42 days
Minimum password age	0 days
Minimum password length	0 characters
Password must meet complexity re	Disabled
Store password using reversible e	Disabled

Account Management



Account policy enforcement

- Password history
- Password reuse
- Password length
- Generic account prohibition
- Group based privileges
- User assigned privileges
- User access reviews
- Continuous monitoring



THANK YOU