* + 1. Interfaces
       1. SCOS Client Control Service
          1. SCOS Client Control Service: Client Authentication: Function
          2. SCOS Client Control Service: Client Authentication: Interfaces

Table 11 – SCOS Client Authenticate Request Object Definition

SCOSClientAuthenticateRequest (011)

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Name | ID | Type | Length | Description |
| SCOSClientName | .01 | String | 64 bytes | The name of the SCOS User registered with SCOS operator. |
| SCOSClientPassword | .02 | String | 64 bytes | The hashed password of the SCOS User registered with SCOS operator. |
| SCOSOperator | .03 | Integer | 64 bytes | The name of the SCOS operator. |
| ManagerCertPath | .04 | String | 256 bytes | The path of the Manager certificate file (Optional). |
| ManagerCertFile | .05 | String | 256 bytes | The name of the Manager certificate file (optional). |
| ManagerKeyFile | .06 | String | 256 bytes | The name of the Manager key file (optional). |
| ManagerCAFile | .07 | String | 256 bytes | The name of the trusted certificate authority (optional). |

Table 12 – SCOS Client Authenticate Response Message Object

SCOSClientAuthenticateReSponse (012)

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Name | ID | Type | Length | Description |
| ManagerID | .01 | String | 64 bytes | The unique ID assigned to the sensor manager. |
| Name | ID | Type | Length | Description |
| ManagerID | .01 | String | 64 bytes | The unique ID assigned to the sensor manager. |
| SCOSClientID | .02 | String | 64 bytes | The unique ID assigned to the SCOS Cient, permanent and unique (or as per SCOS Operator policy). |
| authenticateResponseCode  - OK  - Refused\_unknownuser  - Refused\_invalidcert  - Refused\_unknown | .03 | String | 32 bytes | Association request response  - Association granted  - SM does not recognize username/password  - SM does not accept certificate  - Unknown error |
| authenticateTTL | .04 | Integer | 32 bytes | The time to live of the session in seconds (optional) |

* + - * 1. SCOS Client Control Service: Resource Management (Discovery): Function
        2. SCOS Client Control Service: Resource Management (Discovery): Interfaces

Table 13 – SCOS Discovery Query Message Object

SCOSDiscoveryRequest (013)

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Name | ID | Type | Length | Description |
| SCOSClientID | .01 | String | 64 bytes | The unique ID assigned to the SCOS Client during authorization. |
| ManagerID | .02 | String | 64 bytes | The unique ID assigned to the sensor manager. |
| resourceQuery  - All  - Range [comma-separated list and/or dash-separated range of SDIDs] | .03 | String | 32 bytes | Type of Resource Query  - Manager to return all known Sensor resources  - to query resources on range of SDs |

* + - * 1. SCOS Client Control Service: Sensing Task Management (State Request): Function
        2. SCOS Client Control Service: Sensing Task Management (State Request): Interfaces
      1. Sensor Control Service
         1. Sensor Control Service: SD Authentication and Registration: Functions
         2. Sensor Control Service: SD Authentication and Registration: Interfaces
         3. Sensor Control Service: SD Status Query: Functions
         4. Sensor Control Service: SD Status Query: Interfaces
         5. Sensor Control Service: SD Tasking Service: Functions
         6. Sensor Control Service: SD Tasking Service: Interfaces
      2. SM Data Distribution Service
         1. SM Data Distribution Service: Functions
         2. SM Data Distribution Service: Interfaces