

# API Specifications

Extranet

Document Version 1.3

API Version 1.0

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## File Transfer APIs:

The base URL for the Extranet APIs would be as below  
<https://www.devconnect2nse.com/extranet-api/>

Following are the API endpoints:

| Sr.no | Method | API EndPoint                                                           | Remarks                                                                                            |
|-------|--------|------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------|
| 1     | POST   | /login/{version}                                                       | To login: e.g. /login/1.0                                                                          |
| 2     | POST   | /logout/{version}                                                      | To logout: e.g. /logout/1.0                                                                        |
| 3     | GET    | /member/content/{version}? segment=, folderpath=                       | To get List of Folders and files:<br>/member/content/1.0? segment=, folderpath=                    |
| 4     | GET    | /common/content/{version}? segment=, folderpath=                       | To get common folder and file list :<br>/common/content/1.0? segment=, folderpath=                 |
| 5     | GET    | /member/file/download/{version}? segment=,folderpath=,date=,filename=  | To Download File :<br>e.g. /member/file/download/1.0? segment=,folderpath=,date=,filename=         |
| 6     | GET    | /common/file/download/{version}? segment=, folderpath=,date=,filename= | To Download common file :<br>e.g. /common/file/download/1.0? segment=, folderpath=,date=,filename= |

### Login

This API validates the user credentials. On successful login, a unique token will be provided per request and session will be established with user's system. In subsequent API calls, this token should be passed in HTTP header "Authorization".

For Password:

- The password needs to be sent in a hash string
- The password needs to be sent in encrypted format using AES256. The encryption private key will be generated on user registration
- After 5 invalid attempts with wrong password, the user will not be allowed to generate the token by calling the API. User need to update the password from Member portal – "Extranet API Registration" screen

For Token:

- Login session validity will be for 60 mins.
- After every 60 mins the token will expire and the approach is that of single token and not refresh token.

| Method | API EndPoint     | Header | Content-Type     |
|--------|------------------|--------|------------------|
| POST   | /login/{version} |        | application/json |

### Request Object values

| Sr. No. | Field Description | Field Name | Data Type | Description                                                                                            | Expected Values & Validations | Optional /Mandatory |
|---------|-------------------|------------|-----------|--------------------------------------------------------------------------------------------------------|-------------------------------|---------------------|
| 1       | Member Code       | memberCode | Char(5)   | Member Code                                                                                            |                               | M                   |
| 2       | Login Id          | loginId    | Char(16)  | Login ID                                                                                               |                               | M                   |
| 3       | Password          | password   | Char(50)  | Password should encrypted with AES256 encryption using the secret key received during API registration |                               | M                   |

### Request Object Structure (JSON)

```
{
  "memberCode":"06000",
  "loginId":"ApiUser06000",
  "password":"0CxUgThnqIK6gaKU2HnL2A=="
}
```

Password in example is encrypted text

### Response JSON values

| Sr. No. | Field Description | Field Name   | Data Type | Description    |
|---------|-------------------|--------------|-----------|----------------|
| 1       | Member Code       | memberCode   | Char(5)   | Member Code    |
| 2       | Response Code     | responseCode | Char(3)   | Response Code  |
| 3       | Login Id          | loginId      | Char(16)  | Login ID       |
| 4       | Token             | token        | String    | Unique Token   |
| 5       | Status            | status       | String    | Request Status |

### Response Object Structure (JSON)

```
{
  "memberCode":"09100",
  "responseCode":["601"],
  "loginId":"ApiUser09100",
  "token":"eyJhbGciOiJIUzI1NiJ9.eyJzdWIiOiIwOTUwMCIslmV4cCI6MTYzMjIwNzYyOCwiaWF0IjoxNjMyMjA0MDI4LCJqdGkiOiJhNWl0YjZiZi1lZTQwLTQ4NzItOGM4ZC0xNjE5ZjA2Nzk2NTEifQ.gGmBfpIbtP59X6gK28z4l6lIokFgOBOIGjAX-WhjkY5DPJRxHJWtc-TOcDyPjLGAvnHNlvh-SZRRawkxFSNgYw",
  "status":"success"
}
```

### Logout

This API closes the current session and gets the user logged off.

| Method | API EndPoint      | Header        | Content-Type     |
|--------|-------------------|---------------|------------------|
| POST   | /logout/{version} | Session Token | application/json |

**Request JSON values**

| Sr. No. | Field Description | Field Name | Data Type | Description |
|---------|-------------------|------------|-----------|-------------|
| 1       | Member Code       | memberCode | Char(5)   | Member Code |
| 2       | Login Id          | loginId    | Char(16)  | Login ID    |

**Request Object Structure (JSON)**

```
{
  "memberCode":"06000",
  "loginId":"ApiUser06000"
}
```

**Response JSON values**

| Sr. No. | Field Description | Field Name   | Data Type | Description    |
|---------|-------------------|--------------|-----------|----------------|
| 1       | Response Code     | responseCode | Char(3)   | Response Code  |
| 2       | Status            | status       | String    | Request Status |

**Response Object Structure (JSON)**

```
{
  "responseCode":["601"],
  "status":"success"
}
```

**Get Member Files/Folders**

This API will give the list of member Folders and Files present in the folder path provided as per single level directory.

| Method | API EndPoint              | Header        | Content-Type |
|--------|---------------------------|---------------|--------------|
| GET    | /member/content/{version} | Session Token |              |

**Request Object values**

| Sr. No. | Field Description | Field Name | Data Type | Description                                                    | Expected Values & Validations                      | Optional/ Mandatory |
|---------|-------------------|------------|-----------|----------------------------------------------------------------|----------------------------------------------------|---------------------|
| 1       | Segment           | segment    | String    | Segment for which folder and file is to be accessed.           | CM<br>FO<br>CD<br>CO<br>SLB<br>MFSS<br>DEBT<br>WDM | <b>M</b>            |
| 2       | Folder Path       | folderPath | String    | Folder Path for which list of Folders and files are Requested. | /                                                  | <b>M/O</b>          |

/member/content/1.0?segment=CM&folderpath=/Downloads

### Response Object values

| Sr. No. | Field Description    | Field Name   | Data Type | Description                                | Expected Values & Validations |
|---------|----------------------|--------------|-----------|--------------------------------------------|-------------------------------|
| 1       | Timestamp            | timestamp    | TimeStamp | Timestamp of response                      |                               |
| 2       | Version No           | versionNo    | String    | API Version                                |                               |
| 3       | Response Code        | responseCode | String    | Application Processing status code         |                               |
| 4       | Response Description | reponseDesc  | String    | Application Processing status description  |                               |
| 5       | Data                 | data         | Array     | List of data values of type 'content list' |                               |

### Content List

| Sr. No. | Field Description | Field Name  | Data Type | Description                                           | Expected Values & Validations |
|---------|-------------------|-------------|-----------|-------------------------------------------------------|-------------------------------|
| 1       | Path              | folderPath  | String    | Path where the folder is placed                       |                               |
| 2       | Name              | name        | String    | Name of file or folder                                |                               |
| 3       | Type              | type        | String    | Identifier of whether the content is a file or folder | Folder or File                |
| 4       | Last Updated      | lastUpdated | Timestamp | Last updated time stamp of the file                   |                               |

```
{
  "timestamp": "2022-10-07T07:18:20Z",
  "versionNo": "1.0",
  "responseCode": ["601"],
  "responseDesc": "Success",
  "data": [
    {
      "folderPath": "/",
      "name": "new Folder",
      "type": "Folder",
      "lastUpdated": "2022-10-07T07:18:20Z"
    },
    {
      "folderPath": "/",
      "name": "test.txt",
      "type": "File",
      "lastUpdated": "2022-10-07T07:18:20Z"
    }
  ]
}
```

## Download File

This API will allow users to download member files for the selected segments. This API can be invoked either by using the exact file name or by using the date for downloading all the files under a given folder.

When downloading multiple files under a single folder the format of the files would be gzip.

| Method | API EndPoint                    | Header        | Content-Type |
|--------|---------------------------------|---------------|--------------|
| GET    | /member/file/download/{version} | Session Token |              |

## Request Object values

| Sr. No. | Field Description | Field Name | Data Type | Description                                                              | Expected Values & Validations                      | Optional/Mandatory |
|---------|-------------------|------------|-----------|--------------------------------------------------------------------------|----------------------------------------------------|--------------------|
| 1       | Segment           | segment    | String    | Segment for which folder and file is to be accessed                      | CM<br>FO<br>CD<br>CO<br>SLB<br>MFSS<br>DEBT<br>WDM | M                  |
| 2       | Folder Path       | folderPath | String    | Folder path from where file needs to be download                         |                                                    | M                  |
| 3       | Date              | date       | String    | Date for which the files in the particular folder needs to be downloaded | DDMMYYYY                                           | O                  |
| 4       | File Name         | filename   | String    | Name of the file which is to be downloaded                               |                                                    | O                  |

/member/file/download/1.0?segment=CM&folderPath=/Downloads&filename=text.txt

/member/file/download/1.0?segment=CM&folderPath=/Downloads&date=01012022

## Response Object values

### Multipart File

Complete data stream of the file contents.

### Get Common Files/Folders

This API will give the list of common Folders and Files present in the folder path provided as per single level directory.

| Method | API EndPoint              | Header        | Content-Type |
|--------|---------------------------|---------------|--------------|
| GET    | /common/content/{version} | Session Token |              |

### Request Object values

| Sr. No. | Field Description | Field Name | Data Type | Description                                         | Expected Values & Validations                      | Optional/Mandatory |
|---------|-------------------|------------|-----------|-----------------------------------------------------|----------------------------------------------------|--------------------|
| 1       | Segment           | segment    | String    | Segment for which folder and file is to be accessed | CM<br>FO<br>CD<br>CO<br>SLB<br>MFSS<br>DEBT<br>WDM | M                  |
| 2       | Folder Path       | folderPath | String    | Folder Path for which list of Folders are Requested |                                                    | M                  |

/common/content/1.0?segment=CM&folderpath=/Downloads

### Response Object values

| Sr. No. | Field Description    | Field Name   | Data Type | Description                                       | Expected Values & Validations |
|---------|----------------------|--------------|-----------|---------------------------------------------------|-------------------------------|
| 1       | Timestamp            | timestamp    | Timestamp | Timestamp of response                             |                               |
| 2       | Version No           | versionNo    | String    | API Version                                       |                               |
| 3       | Response Code        | responseCode | String    | Application Processing status code                |                               |
| 4       | Response Description | reponseDesc  | String    | Application Processing status description         |                               |
| 5       | Data                 | data         | Array     | List of data values of type 'common content list' |                               |

### Common Content List

| Sr. No. | Field Description | Field Name  | Data Type | Description                                           | Expected Values & Validations |
|---------|-------------------|-------------|-----------|-------------------------------------------------------|-------------------------------|
| 1       | Path              | folderPath  | String    | Path where the folder is placed                       |                               |
| 2       | Name              | name        | String    | Name of file or folder                                |                               |
| 3       | Type              | type        | String    | Identifier of whether the content is a file or folder | Folder or File                |
| 4       | Last Updated      | lastUpdated | Timestamp | Last updated time stamp of the file                   |                               |

```

{
  "timestamp" : "2022-10-07T07:18:20Z",
  "versionNo" : "1.0",
  "responseCode" : ["601"],
  "responseDesc" : "Success",
  "data": [
    {
      "folderPath": "/",
      "name": "new Folder"
      "type": "Folder",
      "lastUpdated" : "2022-10-07T07:18:20Z"
    },
    {
      "folderPath": "/",
      "name": "test.txt"
      "type": "File",
      "lastUpdated" : "2022-10-07T07:18:20Z"
    }
  ]
}

```

### Download Common File

This API will allow users to download common files for the selected segments. This API can be invoked either by using the exact file name or by using the date for downloading all the files under a given folder.

When downloading multiple files under a single folder the format of the files would be gzip.

| Method | API EndPoint                    | Header        | Content-Type |
|--------|---------------------------------|---------------|--------------|
| GET    | /common/file/download/{version} | Session Token |              |

### Request Object values

| Sr. No. | Field Description | Field Name | Data Type | Description                                                              | Expected Values & Validations                      | Optional/Mandatory |
|---------|-------------------|------------|-----------|--------------------------------------------------------------------------|----------------------------------------------------|--------------------|
| 1       | Segment           | segment    | String    | Segment for which folder and file is to be accessed                      | CM<br>FO<br>CD<br>CO<br>SLB<br>MFSS<br>DEBT<br>WDM | <b>M</b>           |
| 2       | FilePath          | filePath   | String    | File path from where file needs to be download                           |                                                    | <b>M</b>           |
| 3       | Date              | date       | String    | Date for which the files in the particular folder needs to be downloaded | DDMMYYYY                                           | <b>O</b>           |

|   |           |          |        |                                            |  |   |
|---|-----------|----------|--------|--------------------------------------------|--|---|
| 4 | File Name | filename | String | Name of the file which is to be downloaded |  | 0 |
|---|-----------|----------|--------|--------------------------------------------|--|---|

/common/file/download/1.0?segment=CM&folderPath=/Downloads&filename=text.txt

/common/file/download/1.0?segment=CM&folderPath=/Downloads&date=01012022

### ***Response Object value***

Multipart File

Complete data stream of the file contents

## **Response Codes**

### ***Status Codes***

| Codes | Description                                                          |
|-------|----------------------------------------------------------------------|
| 200   | Successful response body. Complete data stream of the file contents. |
| 400   | Bad request                                                          |
| 401   | Unauthorised Token                                                   |
| 403   | Forbidden if the user does not have permission.                      |
| 404   | File not found                                                       |
| 405   | Method not found                                                     |
| 500   | Internal Server Error                                                |

## Validation Error Codes and Description

| Validations Error Codes | Validation Messages                         | Description                                                              |
|-------------------------|---------------------------------------------|--------------------------------------------------------------------------|
| 601                     | Success                                     | When the API is a Success                                                |
| 605                     | Something went wrong                        | It's a technical error                                                   |
| 606                     | Method unknown                              | Invalid HTTP (POST,GET) method                                           |
| 607                     | Concurrent User limit exceeded              | Multiple API requests triggered together and the API call limit exceeded |
| 701                     | Invalid member code or login id or password | For Log In API                                                           |
| 702                     | User is disabled                            | User is disabled                                                         |
| 703                     | Invalid member code or login id             | For Log Out API                                                          |
| 704                     | Member not Eligible                         | Member not eligible to access the Segment                                |
| 706                     | Invalid request                             | Request made for any API is invalid                                      |
| 709                     | Invalid File                                | For file upload API – invalid file format                                |
| 710                     | Date invalid                                | For file download API                                                    |
| 711                     | Segment invalid                             | For upload API and download/content list API                             |
| 712                     | Folder path invalid                         | For upload API and download/content list API                             |
| 713                     | Filename invalid                            | For file upload/download API                                             |
| 714                     | File not Found                              | File not Found                                                           |
| 715                     | Folder not Found                            | Folder not Found                                                         |
| 802                     | Invalid token                               | For all APIs                                                             |
| 803                     | Authentication token expired                | For all APIs                                                             |
| 917                     | Not valid record                            | Blank or null values not allowed                                         |
| 920                     | Invalid version no                          | For all APIs                                                             |
| 921                     | Invalid syntax                              | Internal error                                                           |
| 923                     | Invalid URL                                 | URL name is incorrect                                                    |
| 924                     | Invalid content type                        | Invalid request body data type                                           |
| 925                     | Authentication server down                  | Authentication server down                                               |
| 956                     | Password attempt Limit Exceeded             | Multiple attempts made with incorrect password                           |
| 959                     | API call not allowed                        | User not allowed to access the API                                       |

## Version History

| Version History |              |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
|-----------------|--------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Version         | Release date | Change Description                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| 1.0             | 12/09/2022   | Base version                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
| 1.1             | 14/10/2022   | <ul style="list-style-type: none"> <li>• Section for Login – The login session validity changed from 30 min to 60 mins</li> <li>• Section Assumptions – The point related to API Key has been removed</li> <li>• For Login API – In the Request Object value and Response Object value table, the parameters have been updated along with the values in Request Object Structure (JSON) and Response Object Structure (JSON) tables.</li> <li>• For Logout API - In the Request Object value and Response Object value table, the parameters have been updated along with the values in Request Object Structure (JSON) and Response Object Structure (JSON) tables.</li> <li>• Get Member Files/Folders and Get Common Files/Folders – In the Content List and Common Content list parameters have been updated respectively.</li> </ul> |
| 1.2             | 15/11/2022   | <ul style="list-style-type: none"> <li>• Section File Transfer APIs updated - Base URL added</li> <li>• Section for Validation Error Codes and Description added</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| 1.3             | 30/11/2022   | <ul style="list-style-type: none"> <li>• Section for validation Error Codes and Description - Description for validation codes 711, 712 and 713 updated</li> <li>• Version number updated in remarks and example</li> <li>• Timestamp attribute renamed to 'Last updated' in API for 'Get member list' and 'Get common list'</li> <li>• Error codes updated</li> <li>• Login API password details updated</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                      |