



TECHINICAL REQUIREMENTS DOCUMENT FOR RTA-MFR APIs

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Introduction:

SEBI is introducing a common repository for the various details of investors. This would remove the process of capturing redundant details of investors. To proceed further, there would be a set of APIs which have to be provided by SEBI and utilized by RTA, and a set of APIs which have to be provided by RTA and utilized by SEBI.

Definitions:

The following are the definitions for the terms used in the document:

RTA	Registrar and Transfer Agent
MFR	Mutual Fund Repository at SEBI

How to call:

In order to call the APIs, we need to provide a hostname, port name, API name, parameters of API and the type of API (GET,PUT,POST,DELETE). Internally there will multiple function with the method overriding.

4. Folio Creation :

Rest API => Get_folio_created (multiple parameters)

4.1 GET_UPDATED_ODI:

This service will be used to find out the updated ODI, i.e Other Details of Investor for a Folio and MFR response. The input for this service would be a UMF_id. The ODI contains the fields as per enclosed excel. This service would be provided by SEBI and utilized by RTA to find-out updated ODI of an Investor.

Method: GET_UPDATED_ODI

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund

For successful records the response is as below:

```
{  
  Success:true,  
  Status:200,  
  MFR_id: 123456,  
  First holder_PAN : ABCDE1234,  
  First holder_PEKRN : 12345,  
  First holder_Prefix : ,  
  First holder_FirstName: ,  
  .....And so on for all the fields in ODI  
}
```

Incase of any failure, the response is as below:

```
{  
  Success:false,  
  Error_Code: 1001,  
  Error_Message : Invalid UMF_id  
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
1001	Invalid UMF_id

4.2 GET_DETAIL_ODI:

This service will be used to submit the details of ODI, i.e Other Details of Investor and UMF for a PAN combination and MFR response. The input for this service would be a UMF_id. The ODI contains the fields as per enclosed excel. This service would be provided by SEBI and utilized by RTA to submit data related to all the fields as per enclosed excel.

Method: GET_DETAIL_ODI

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund

For successful records the response is as below:

```
{
  Success:true,
  Status:200,
  MFR_id: 123456,
  First holder_PAN : ABCDE1234,
  First holder_PEKRN : 12345,
  First holder_Prefix : ,
  First holder_FirstName: ,
  .....And so on for all the fields in ODI
}
```

Incase of any failure, the response is as below:

```
{
  Success:false,
  Error_Code: 2001,
  Error_Message : Invalid UMF_id
}
```

```
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
2001	Invalid UMF_id

4.3 GET_FOLIO:

This service will be used to get the details of Folios for a PAN combination and details of ODI against all folios and RTA response. The input for this service would be the PAN details of an investor. The output of this service would be as per MFR prescribed format (to the extent available with RTA). This service would be provided by RTA and utilized by SEBI.

Method: GET_FOLIO

Input Parameters: Investor(first/Second/third holder PAN)

For successful records the response is as below:

```
{
  Success:true,
  Status:200,
  MFR_id: 123456,
  First holder_PAN : ABCDE1234,
  First holder_PEKRN : 12345,
  First holder_Prefix : ,
  First holder_FirstName: ,
  .....And so on for all the fields in ODI
}
```

Incase of any failure, the response is as below:

```
{
```

```
Success:false,  
Error_Code: 3001,  
Error_Message : Invalid PAN details  
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
3001	Invalid PAN details

4.4 GET_FOLIO_LOCK_UNLOCK :

This service will be used to find the status of Folio Lock of an investor. The input for this service would be UMF_id and Folio_Number. This service would be provided by RTA and utilized by SEBI to find the Folio flag (Lock or Unlock) by investors.

Method: GET_FOLIO_LOCK_UNLOCK

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund and Folio_number

For successful records the response is as below:

```
{  
Success:true,  
Folio_Flag : Lock  
}
```

Incase of any failure, the response is as below:

```
{  
Success:false,  
Error_Code: 4001,  
Error_Message : Invalid UMF_id  
}
```


Following are the service specific error codes and error messages:

Error Code	Error Message
4001	Invalid UMF_id
4002	Invalid Folio Number

A tabular summary:

Who's Calling	API Called	API runs at	Method	Predicate	Output
RTA	MFR	MFR end	GET_UPDATE D_ODI	UMF_id	Data related to all the fields as per enclosed excel
RTA	MFR	MFR end	GET_DETAIL_ ODI	UMF_id	Data related to all the fields as per enclosed excel
MFR	RTA	RTA end	GET_FOLIO	Investor (First/ Second/ Third Holder PAN)	As per MFR described format (to the extend available with RTA)
MFR	RTA	RTA end	GET_FOLIO_L OCK_UNLOC K	UMF_ID, FOLIO_NO	Folio_flag as per lock or unlock

5. Folio Updation:

Rest API => Get_folio_UPDATION

5.1 GET_INVESTOR_DETAIL:

This service will be used to find the Investor details and MFR response. The input for this service would be UMF_id. This service would be provided by SEBI and utilized by RTA to find the data related to all the fields of an investor, as per enclosed excel.

Method: GET_INVESTOR_DETAIL

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund

For successful records the response is as below:

```
{  
  Success:true,  
  Status:200,  
  MFR_id: 123456,  
  First holder_PAN : ABCDE1234,  
  First holder_PEKRN : 12345,  
  First holder_Prefix : ,  
  First holder_FirstName: ,  
  .....And so on for all the fields in ODI  
}
```

Incase of any failure, the response is as below:

```
{  
  Success:false,  
  Error_Code: 5001,
```

Error_Message : Invalid UMF_id

}

Following are the service specific error codes and error messages:

Error Code	Error Message
5001	Invalid UMF_id

5.2 PUT_UPDATED_FOLIO:

This service will be used to submit the updated details of a folio for an investor. The input for this service would be UMF_id and the columns to be updated as per the attached excel. Only the changed field would be provided. This service would be provided by SEBI and utilized by RTA.

Method: PUT_UPDATED_FOLIO

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund and the columns to be updated.

For successful records the response is as below:

```
{
  Success:true,
  Status:200,
  MFR_id: 123456,
  First holder_PAN : ABCDE1234,
  First holder_PEKRN : 12345,
  First holder_Prefix : ,
  First holder_FirstName: ,
  .....And so on for all the fields in ODI
}
```

Incase of any failure, the response is as below:

```
{
```

```
Success:false,

Error_Code: 6001,

Error_Message : Invalid UMF_id

}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
6001	Invalid UMF_id

5.3 PUT_UPDATED_FOLIO:

This service will be used to update the details of ODI (as chosen / updated by the investor), for replication in folios held by RTA and RTA response. The input for this service would be UMF_id and the columns to be updated as per the attached excel. Only the changed field would be provided. This service would be provided by RTA and utilized by SEBI.

Method: PUT_UPDATED_FOLIO

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund and the columns to be updated.

For successful records the response is as below:

```
{

Success:true,

Status:200,

MFR_id: 123456,

First holder_PAN : ABCDE1234,

First holder_PEKRN : 12345,

First holder_Prefix : ,

First holder_FirstName: ,

.....And so on for all the fields in ODI

}
```

Inc case of any failure, the response is as below:

```
{  
  Success:false,  
  Error_Code: 7001,  
  Error_Message : Invalid UMF_id  
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
7001	Invalid UMF_id

5.4 PUT_NEW_FOLIO:

This service will be used to submit details of additional / new folios opened for the same PAN / folio closed for any MFR UMF. The input for this service would be UMF_id, Fund Code and the Folio Code. This service would be provided by SEBI and utilized by RTA.

Method: PUT_NEW_FOLIO

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund, the FUND and FOLIO codes.

For successful records the response is as below:

```
{  
  Success:true,  
  Status:200,  
  UMF_ID: 1234,  
  Fund_Code : FUND123,  
  Folio_Code : FOLIO123,  
}
```

Incase of any failure, the response is as below:

```
{  
  Success:false,  
  Error_Code: 8001,
```

Error_Message : Invalid UMF_id

}

Following are the service specific error codes and error messages:

Error Code	Error Message
8001	Invalid UMF_id
8002	Invalid Fund_Code
8003	Invalid Folio_Code

A tabular summary :

Who's calling	API Called	API runs at	Method	Predicate	Input	Output
RTA	MFR	MFR end	GET_INVESTOR_DETAIL	UMF_ID	-	Data related to all the fields as per enclosed excel
RTA	MFR	MFR end	PUT_UPDATED_FOLIO	UMF_ID	Columns to be updated as per attached excel sheet (changed field only)	-
MFR	RTA	RTA end	PUT_UPDATED_FOLIO	UMF_ID	Columns to be updated as per attached excel sheet (changed field only)	-
RTA	MFR	MFR end	PUT_NEW_FOLIO	UMF_ID	Columns are FUND and FOLIO	-

6.SOT / SOH : Statement of Transactions or Statement of Holding

Rest API => Get_SOT_SOH

6.1 GET_TRANSACTIONS:

This service would be used to fetch only the Transaction statement for a PAN number and Folio Code. The input of this service would be a PAN number and a Folio Code. The output of this service would be as per the list of data elements agreed between MFR and RTA. The service would be provided by RTA and utilised by SEBI.

Method: GET_TRANSACTIONS

Input Parameters: PAN number and Folio Code

For successful records the response is as below:

```
{
  Success:true,
  Status:200,
  PAN : ABCDE1234F,
  FOLIO_Code : ,
  Transaction_No : ,
  Transaction_Date : ,
  .....and so on as agreement between MFR and RTA
}
```

Incase of any failure, the response is as below:

```
{
  Success:false,
  Error_Code: 9101,
  Error_Message : Invalid PAN Number
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
9101	Invalid PAN Number
9102	Invalid Folio Code

6.2 GET_HOLDING_STM:

This service would be used to fetch only the Holding statement for a PAN number and Folio Code. The input of this service would be a PAN number and a Folio Code. The output of this service would be as per the list of data elements agreed between MFR and RTA. The service would be provided by RTA and utilised by SEBI.

Method: GET_HOLDING_STM

Input Parameters: PAN number and Folio Code

For successful records the response is as below:

```
{
  Success:true,
  Status:200,
  PAN : ABCDE1234F,
  FOLIO_Code : ,
  .....and so on as agreement between MFR and RTA
}
```


Incase of any failure, the response is as below:

```
{  
  Success:false,  
  Error_Code: 9201,  
  Error_Message : Invalid PAN Number  
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
9201	Invalid PAN Number
9202	Invalid Folio Code

6.3 GET_TRANSACTIONS_HOLDING:

This service would be used to fetch both Transaction & Holding statements for a PAN number and Folio Code. The input of this service would be a PAN number and a Folio Code. The output of this service would be as per the list of data elements agreed between MFR and RTA. The service would be provided by RTA and utilised by SEBI.

Method: GET_TRANSACTIONS_HOLDING

Input Parameters: PAN number and Folio Code

For successful records the response is as below:

```
{  
  Success:true,  
  Status:200,  
  PAN : ABCDE1234F,  
  FOLIO_Code : ,
```

Transaction_No : ,

Transaction_Date : ,

.....and so on as agreement between MFR and RTA

}

Incase of any failure, the response is as below:

{

Success:false,

Error_Code: 9301,

Error_Message : Invalid PAN Number

}

Following are the service specific error codes and error messages:

Error Code	Error Message
9301	Invalid PAN Number
9302	Invalid Folio Code

A tabular summary :

Who's calling	API Called	API runs at	Method	Predicate/s	Output
MFR	RTA	RTA end	GET_TRANSACTIONS	PAN or Folio	As per the list of data elements agreed between MFR and RTA
MFR	RTA	RTA end	GET_HOLDING_STM	PAN or Folio	As per the list of data elements agreed between MFR and RTA

MFR	RTA	RTA end	GET_TRANSACTIONS_HOLDING	PAN or Folio	As per the list of data elements agreed between MFR and RTA
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7.Unclaimed Dividend/Interest/Redemption Details

Rest API => Get_UNCLAIMED

7.1 PUT_UNCLAIMED:

This service will be used to submit the details of any unclaimed dividend, interest, redemption etc. and status change therein if any. This service would be provided by SEBI and utilized by RTA. The output of this service would be as per the list of data elements agreed between MFR and RTA.

Method: PUT_UNCLAIMED

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund, details of any unclaimed dividend, interest, redemption etc. and status change therein if any

For successful records the response is as below:

```
{
  Success:true,
  Status:200,
  UMF_ID: 1234,
  Unclaimed_Dividend:,
  Interest : ,
  Redemption : ,
}
```

Incase of any failure, the response is as below:

```
{
  Success:false,
  Error_Code: 10001,
  Error_Message : Invalid UMF_id
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
10001	Invalid UMF_id

7.2 GET_UNCLAIMED:

This service will be used to fetch the details of any unclaimed dividend, interest, redemption etc. and any other change. This service would be provided by RTA and utilized by SEBI. The output of this service would be as per the list of data elements agreed between MFR and RTA.

Method: GET_UNCLAIMED

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund.

For successful records the response is as below:

```
{
  Success:true,
  Status:200,
  UMF_ID: 1234,
  Unclaimed_Dividend:,
  Interest : ,
  Redemption : ,
}
```

Incase of any failure, the response is as below:

```
{
Success:false,
Error_Code: 11001,
Error_Message : Invalid UMF_id
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
11001	Invalid UMF_id

A tabular summary:

Who's calling	API called	API runs at	Method	Predicate/s	Output
RTA	MFR	MFR	PUT_UNCLAI MED	UMF_ID	As per the list of data elements agreed between MFR and RTA
MFR	RTA	RTA	GET_UNCLAI MED	UMF_ID	As per the list of data elements agreed between MFR and RTA

8. Grievance

Rest API => Get_GREVANCES

8.1 PUT_GREVANCE_DETAILS

This service will be used to submit the details and status of a complaint as per the excel provided by MFR. The input for this service would be UMF_id and the details and status of a complaint. This service would be provided by SEBI and utilized by RTA.

Method: PUT_GREVANCE_DETAILS

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund.

For successful records the response is as below:

```
{  
  Success:true,  
  Status:200,  
  UMF_ID: 1234,  
  Complaint_Status: Pending,  
  Complaint_Info : ,  
}
```

Incase of any failure, the response is as below:

```
{  
  Success:false,  
  Error_Code: 12001,  
  Error_Message : Invalid UMF_id  
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
12001	Invalid UMF_id

8.2 GET_GREVANCE_DETAILS:

This service will be used to fetch the details and status of a complaint as per the excel provided by MFR. The input for this service would be UMF_id. This service would be provided by RTA and utilized by SEBI.

Method: GET_GREVANCE_DETAILS

Input Parameters: UMF_id, where UMF stands for Unified Mutual Fund.

For successful records the response is as below:

```
{
  Success:true,
  Status:200,
  UMF_ID: 1234,
  Complaint_Status: Pending,
  Complaint_Info : ,
}
```

Incase of any failure, the response is as below:

```
{
  Success:false,
  Error_Code: 13001,
  Error_Message : Invalid UMF_id
}
```

Following are the service specific error codes and error messages:

Error Code	Error Message
13001	Invalid UMF_id

A tabular summary :

Who's calling	API Called	API runs at	Method	Insert/Update	Select	Predicates
RTA	MFR	MFR	PUT_GREVANCE_DETAILS	Details as per excel provided by MFR	-	UMF_ID
MFR	RTA	RTA	GET_GREVANCE_DETAILS	-	Details as per excel provided by MFR	UMF_ID