FCIS MACHINE LEARNING RELATED TABLES Data Model Release New branch created for FCIS\_14.7.2.0.0\_INNOVATIONS

Oracle FLEXCUBE Investor Servicing

[May] [2023]





FCIS MACHINE LEARNING RELATED TABLES Data Model [May] [2023]

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#### 1. INTRODUCTION

This document contains the data dictionary information of FCIS MACHINE LEARNING RELATED TABLES module. For each table that belongs to the module, FCIS ML, it provides the following information - Table Description

- Constraints
- Column details that contain column name, data type and descriptions.



#### 2. FCIS MACHINE LEARNING RELATED TABLES

# 2.1. MLTB\_FCIS\_FUND\_MASTER

# **Description -**

It contains the fund details for FCIS.

#### Constraints -

Primary Key
-------------

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Buss_Entity_Id
FUND_ID	VARCHAR2(6)	Fund Id
REFNO	VARCHAR2(16)	System Generated Reference Number
RUL_EFF_DT	DATE	Ruleeffectivedate
AUTH_STAT	VARCHAR2(1)	Auth_Stat
FUND_STRT_DT	DATE	Fundstartdate
FUND_NAME	VARCHAR2(60)	Fundname
FUND_NAME_SHRT	VARCHAR2(90)	Fundnameshort
FUND_CLASS	VARCHAR2(1)	Fundclass
FUND_TYPE	NUMBER(38)	Fundtype
FUND_FAMILY	VARCHAR2(6)	Fundfamily
FUND_BASE_CCY	VARCHAR2(3)	Fundbasecurrency
FUND_CTY	VARCHAR2(3)	Fundcountry
FISCAL_STRT_YEAR	DATE	Fiscalstartyear
FISCAL_END_YEAR	DATE	Fiscalendyear
AMC_ID	VARCHAR2(12)	Amcid
BROKER_ALLOWED	NUMBER(1)	Brokersallowed
REGISTRAR_ID	VARCHAR2(12)	Registrarid
TRUSTEE_ID	VARCHAR2(12)	Trusteeid
LATEST_RULE	NUMBER(1)	Latestrule
MIN_HOLD_PER	NUMBER	Minholdingperiod
PRIM_REGIS_ADD	VARCHAR2(255)	Primaryregaddress
FUND_TAX_ID	VARCHAR2(25)	Fundtaxid
FUND_ID_NUM	VARCHAR2(25)	Fundidentificationnumber
FUND_TICKER_SYM	VARCHAR2(25)	Fundtickersymbol
ALLOW_IRA_INVMNT	NUMBER(1)	Allowirainvestments
CUSTODIAN	VARCHAR2(12)	Custodian
FUND_SUSPENDED	NUMBER(1)	Fundsuspended
MIN_AMT_TAX_INDV	NUMBER(30,12)	Minamountfortaxidindv
MIN_AMT_TAX_CORP	NUMBER(30,12)	Minamountfortaxidcor
RECORD_STAT	CHAR(1)	Record_Stat
EXISTING_FUND	NUMBER(1)	Existingfund
UMBRELLA_FUND	NUMBER(1)	Umbrellafund
HEDGE_FUND	VARCHAR2(1)	Hedgefund
FUND_ENABLED	NUMBER(1)	Fundenabled
COE_ENABLED	VARCHAR2(1)	Coeenabled
LEGAL_ENTITY	VARCHAR2(12)	Legalentity
FUND_CLOS_DT	DATE	Fundcloseddate



#### 2.2. MLTB\_FCIS\_INCH\_PROCESSSTATUS

#### **Description -**

It is the master table which store the complete detail of each extract

#### Constraints -

Primary Key	REFNO,BUSINESS_ENTITY_ID
, ,	

#### **Column Descriptions -**

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	BUSINESS ENTITY ID
REFNO	VARCHAR2(50)	Reference Number
EXTRACT_START_DT	DATE	Extract Start Date
EXTRACT_END_DT	DATE	Extract End Date
HAND_OFF_STATUS	NUMBER(1)	Hand Off Status
PROCESSAPPDATE	DATE	Process App Date
LATESTPROCESS	NUMBER(1)	Latest Process
POST_PROCESS_STAT	NUMBER(1)	Post Process Status
CCY	VARCHAR2(3)	Currency
SILENT_PERIOD	NUMBER	Silent Period
ATTRITION_DT	DATE	Attrition Date
MODEL_STAT	NUMBER(1)	Model Status
MODEL_HIST_REFRESH	VARCHAR2(16)	Model History Refresh
MODEL_BUILD_LAST_RUN	DATE	Model bulid Last Run
MODEL_BUILD_STAT	VARCHAR2(16)	Model bulid Status
MODEL_EXEC_LAST_RUN	DATE	Model execute Last run
MODEL_EXEC_REFRESH	VARCHAR2(16)	Modelexecute Refresh

## 2.3. MLTB\_FCIS\_INCH\_RISK\_CAT

#### **Description -**

It contains the customer risk details for each extraction.

#### Constraints -

Primary Key	BUSINESS_ENTITY_ID,REFNO,RISK_CATEGORY
-------------	--

## **Column Descriptions -**

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Entity Id
REFNO	VARCHAR2(50)	System Generated Reference Number
RISK_CATEGORY	NUMBER	Risk Category
INV_ACC_COUNT	NUMBER	No of Investor Account
PERCENTAGE	NUMBER	Risk Pecentage

## 2.4. MLTB\_FCIS\_INCH\_RISK\_CAT\_HIST

## **Description -**

It contains the purged customer risk details for each extraction.



#### Constraints -

Primary Key	BUSINESS_ENTITY_ID,REFNO,RISK_CATEGORY
-------------	--

#### **Column Descriptions -**

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Entity Id
REFNO	VARCHAR2(50)	System Generated Reference Number
RISK_CATEGORY	NUMBER	Risk Category
INV_ACC_COUNT	NUMBER	No of Investor Account
PERCENTAGE	NUMBER	Risk Pecentage

## 2.5. MLTB\_FCIS\_INCH\_SEG

# **Description -**

It contains the customer segment details for each extraction.

#### Constraints -

Primary Key	BUSINESS_ENTITY_ID,REFNO,PRED_SEG
-------------	-----------------------------------

## **Column Descriptions -**

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Entity Id
REFNO	VARCHAR2(50)	System Generated Reference Number
PRED_SEG	NUMBER	Predicted Segment
PER_DISTB	NUMBER	Predicted Distribution
REL_PER	VARCHAR2(100)	Relationship Period
FIR_INV_AMT	VARCHAR2(100)	First Invested Amount
TOT_INV_FUNDS_LCY	VARCHAR2(100)	Total Investment across funds in LCY
MIN_GAP_INV	VARCHAR2(100)	Median Gap between Investment
DAYS_LST_INV	VARCHAR2(100)	Days since last Investment

## 2.6. MLTB\_FCIS\_INCH\_SEG\_HIST

## **Description -**

It contains the purged customer segment details for each extraction.

#### Constraints -

Primary Key	BUSINESS_ENTITY_ID,REFNO,PRED_SEG
-------------	-----------------------------------

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Entity Id
REFNO	VARCHAR2(50)	System Generated Reference Number
PRED_SEG	NUMBER	Predicted Segment
PER_DISTB	NUMBER	Predicted Distribution
REL_PER	VARCHAR2(100)	Relationship Period
FIR_INV_AMT	VARCHAR2(100)	First Invested Amount
TOT_INV_FUNDS_LCY	VARCHAR2(100)	Total Investment across funds in LCY
MIN_GAP_INV	VARCHAR2(100)	Median Gap between Investment
DAYS_LST_INV	VARCHAR2(100)	Days since last Investment



# 2.7. MLTB\_FCIS\_INVACC\_CHURN

# **Description -**

This table contains the FCIS extracted and processed data for the ML engine

#### Constraints -

Primary Key	BUSINESS_ENTITY_ID,REFNO,INV_ACC
-------------	----------------------------------

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Business Entity ID
INV_ACC	VARCHAR2(12)	Investment Account ID
REFNO	VARCHAR2(16)	System Generated Reference Number
INV_TYP	VARCHAR2(1)	Investor Type
INV_CAT	VARCHAR2(2)	Investor Category
RESIDENT	VARCHAR2(1)	Resident Status
AGE	NUMBER	Age of investor
LCL_AMC_DIST	VARCHAR2(12)	Local_AMC_Dist
DOM_CTRY	VARCHAR2(3)	DomicileCountry
NATION	VARCHAR2(15)	Nationality
INV_RISK_LVL	VARCHAR2(2)	InvestorRiskLevel
PRIM_INV_CCY	VARCHAR2(3)	PrimaryInvestmentCcy
REL_PER	NUMBER	last transaction date - firstinvestment date
FIR_INV_DT	DATE	Date of the 1st investment (buy)
FIR_INV_AMT	NUMBER	Gross amount of first investment(buy) transaction.
FIR_FUND_INV	VARCHAR2(16)	Fund Id of first investment(buy) transaction.
TOT_FUNDS	NUMBER	Total number of funds the customer has invested(buy)
MIN_INV_FUND_LCY	NUMBER	Minimum amount of investment(buy) the customer has across
		funds
MED_INV_FUND_LCY	NUMBER	Median amount of investment(buy) the customer has across funds
MAX_INV_FUND_LCY	NUMBER	Maximum amount of investment(buy) the customer has across
		funds
TOT_INV_FUNDS_LCY	NUMBER	Total amount of investment(buy) the customer has across funds
MIN_GAP_INV	NUMBER	Minimum gap period in days between investments(buy)
MED_GAP_INV	NUMBER	Median gap period in days between investments(buy)
MAX_GAP_INV	NUMBER	Maximum gap period in days between investments(buy)
LST_FUND_INV	VARCHAR2(16)	Last fundid the customer has invested as of today.
DAYS_LST_INV	NUMBER	date of extract-date of last transaction
MED_TXN_CCY	NUMBER	Median Number of Transaction Currency used in this investment
		account, considering transactions in each calendar year as a
		period/group.
MAX_TXN_CCY	NUMBER	Maximum Number of Transaction Currency used in this investment
		account, in any given year.
MST_INV_CCY	VARCHAR2(3)	Most used transaction currency - considering entire relationship
		duration.
MST_INV_CCY_CNT	NUMBER	Number of transactions with MST_INV_CCY - considering entire
		relationship duration.
CHURN_STAT	VARCHAR2(1)	ChurnStatus is set to 'Y' if
		Greatest(Days_Since_Last_Inv,Max_Gap_Period_Betwn_Inv) >
		90
DAT_STRT_DT	DATE	Data collection start date



DAT_END_DT	DATE	Data collection end date
LST_FUND_INV_SEG	NUMBER(2)	LST_FUND_INV segment
FIR_FUND_INV_SEG	NUMBER(2)	FIR_INV_FUND segment
PRED_CHURN_STAT	VARCHAR2(1)	Predicted Churn Status
PRED_CHURN_PROB	NUMBER(5,4)	Predicted Churn Probability
PRED_INV_SEG	NUMBER(2)	Predicted segment
PRED_RISK_CATEGORY	VARCHAR2(16)	Risk Category

# 2.8. MLTB\_FCIS\_INVACC\_CHURN\_HIST

## **Description -**

FCIS extracted data and the processed data for the ML engine

#### **Constraints** -

Primary Key	BUSINESS_ENTITY_ID,REFNO,INV_ACC
-------------	----------------------------------

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Business Entity ID
INV_ACC	VARCHAR2(12)	Investment Account ID
REFNO	VARCHAR2(16)	System Generated Reference Number
INV_TYP	VARCHAR2(1)	Investor Type
INV_CAT	VARCHAR2(2)	Investor Category
RESIDENT	VARCHAR2(1)	Resident Status
AGE	NUMBER	Age of investor
LCL_AMC_DIST	VARCHAR2(12)	Local_AMC_Dist
DOM_CTRY	VARCHAR2(3)	DomicileCountry
NATION	VARCHAR2(15)	Nationality
INV_RISK_LVL	VARCHAR2(2)	InvestorRiskLevel
PRIM_INV_CCY	VARCHAR2(3)	PrimaryInvestmentCcy
REL_PER	NUMBER	last transaction date - firstinvestment date
FIR_INV_DT	DATE	Date of the 1st investment (buy)
FIR_INV_AMT	NUMBER	Gross amount of first investment(buy) transaction.
FIR_FUND_INV	VARCHAR2(16)	Fund Id of first investment(buy) transaction.
TOT_FUNDS	NUMBER	Total number of funds the customer has invested(buy)
MIN_INV_FUND_LCY	NUMBER	Minimum amount of investment(buy) the customer has across
		funds
MED_INV_FUND_LCY	NUMBER	Median amount of investment(buy) the customer has across funds
MAX_INV_FUND_LCY	NUMBER	Maximum amount of investment(buy) the customer has across
		funds
TOT_INV_FUNDS_LCY	NUMBER	Total amount of investment(buy) the customer has across funds
MIN_GAP_INV	NUMBER	Minimum gap period in days between investments(buy)
MED_GAP_INV	NUMBER	Median gap period in days between investments(buy)
MAX_GAP_INV	NUMBER	Maximum gap period in days between investments(buy)
LST_FUND_INV	VARCHAR2(16)	Last fundid the customer has invested as of today.
DAYS_LST_INV	NUMBER	date of extract-date of last transaction
MED_TXN_CCY	NUMBER	Median Number of Transaction Currency used in this investment
		account, considering transactions in each calendar year as a
		period/group.
MAX_TXN_CCY	NUMBER	Maximum Number of Transaction Currency used in this investment
		account, in any given year.



MST_INV_CCY	VARCHAR2(3)	Most used transaction currency - considering entire relationship
		duration.
MST_INV_CCY_CNT	NUMBER	Number of transactions with MST_INV_CCY - considering entire
		relationship duration.
CHURN_STAT	VARCHAR2(1)	ChurnStatus is set to 'Y' if
		Greatest(Days_Since_Last_Inv,Max_Gap_Period_Betwn_Inv) >
		90
DAT_STRT_DT	DATE	Data collection start date
DAT_END_DT	DATE	Data collection end date
LST_FUND_INV_SEG	NUMBER(2)	LST_FUND_INV segment
FIR_FUND_INV_SEG	NUMBER(2)	FIR_INV_FUND segment
PRED_CHURN_STAT	VARCHAR2(1)	Predicted Churn Status
PRED_CHURN_PROB	NUMBER(5,4)	Predicted Churn Probability
PRED_INV_SEG	NUMBER(2)	Predicted segment
PRED_RISK_CATEGORY	VARCHAR2(16)	Risk Category

## 2.9. MLTB\_MODEL\_PERF\_LOG

# **Description -**

This table is used for logging the model build and execution process.

#### Constraints -

Primary Key	BUILD_DT_TM,USE_CASE,DATASET,PRODUCT,BUSINESS_ENTITY_ID
-------------	---

## **Column Descriptions -**

COLUMN	DATA TYPE	DESCRIPTION
BUILD_DT_TM	DATE	Build Date
USE_CASE	VARCHAR2(20)	Usecase
DATASET	VARCHAR2(20)	Dataset
PRODUCT	VARCHAR2(20)	Product
MODEL_ALGO	VARCHAR2(30)	Model Algorithm
MODEL_NAME	VARCHAR2(30)	Model Name
BRN_CODE	VARCHAR2(4)	Branch code
PRIM_PERF_MODE	VARCHAR2(20)	Primary preference mode
PRIM_PERF_VALUE	NUMBER(22,3)	Primary Preference Value
SEC_PERF_MODE	VARCHAR2(20)	Secondary preference mode
SEC_PERF_VALUE	NUMBER(22,3)	Secondary Preference Value
RUN_TIME	NUMBER(6)	Runtime
BUSINESS_ENTITY_ID	VARCHAR2(16)	Business Entity ID

# 2.10. MLTW\_FCIS\_INCH\_INVINFO\_TEMP

## **Description -**

It store the investor details during extraction.

#### Constraints -

Primary Key	BUSINESS_ENTITY_ID,INV_ACC,REFNO
-------------	----------------------------------

COLUMN	COLUMN	DATA TYPE	DESCRIPTION
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BUSINESS_ENTITY_ID	VARCHAR2(16)	Entity Id
INV_ACC	VARCHAR2(12)	Investor Account
REFNO	VARCHAR2(16)	System Generated Reference Number
INVESTORTYPE	VARCHAR2(1)	Investor Type
INVESTORCATEGORY	VARCHAR2(2)	Investor Category
RESIDENTSTATUS	VARCHAR2(1)	Resident Status
AGE	NUMBER	Age
LOCAL_AMC_DIST	VARCHAR2(12)	Local AMC/Distributor
DOMICILECOUNTRY	VARCHAR2(3)	Domicile Country
NATIONALITY	VARCHAR2(15)	Nationality
INVESTORRISKLEVEL	VARCHAR2(2)	Investor Risk Level
PRIMARYINVESTMENTCCY	VARCHAR2(3)	Primary Investment Currency
JOBGROUP	NUMBER	Job Group

## 2.11. MLTW\_FCIS\_INCH\_JOBSTAT\_TEMP

#### **Description -**

It store the job details during extraction

#### Constraints -

Primary Key	BUSINESS_ENTITY_ID,JOBGROUP,REFNO
-------------	-----------------------------------

#### **Column Descriptions -**

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Entity Id
JOBGROUP	NUMBER	Job Group
REFNO	VARCHAR2(16)	System Generated Reference Number
STATUS	CHAR(1)	Job Status

## 2.12. MLTW\_FCIS\_INCH\_RATE\_TEMP

#### **Description -**

It store the rate during extraction

#### **Constraints** -

Primary Key	BUSINESS_ENTITY_ID,CCY
-------------	------------------------

#### **Column Descriptions -**

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Entity Id
CCY	VARCHAR2(3)	Currency
RATE	NUMBER(10,2)	Currency Rate

# 2.13. MLTW\_FCIS\_INCH\_TXNINFO\_TEMP

#### **Description -**

It store the transaction details during extraction

#### Constraints -

Primary Key	BUSINESS_ENTITY_ID,INV_ACC,REFNO



# **Column Descriptions -**

COLUMN	DATA TYPE	DESCRIPTION
BUSINESS_ENTITY_ID	VARCHAR2(16)	Entity Id
INV_ACC	VARCHAR2(16)	Investor Account
REFNO	VARCHAR2(16)	System Generated Reference Number
FIRST_INVESTMENT_DATE	DATE	First Investment Date
FIRST_INVESTMENT_AMOUNT	NUMBER	First Investment Amount
FIRST_INVESTED_FUND	VARCHAR2(16)	First Invested Fund
TOTAL_NUMBER_OF_FUNDS	NUMBER	Total Number of Funds Invested
MIN_INVEST_ACROSS_FUNDS_L	NUMBER	Minimum Investment across Fund in LCY
CY		
MED_INVEST_ACROSS_FUNDS_L	NUMBER	Median Investment across Fund in LCY
CY		
MAX_INVEST_ACROSS_FUNDS_L	NUMBER	Maximum Investment across Fund in LCY
CY		
TOT_INV_ACROSS_FUNDS_LCY	NUMBER	Total Investment across funds in LCY
MIN_GAP_PERIOD_BETWN_INV	NUMBER	Minimum Gap between Investment
MED_GAP_PERIOD_BETWN_INV	NUMBER	Median Gap between Investment
MAX_GAP_PERIOD_BETWN_INV	NUMBER	Maximum Gap between Investment
LAST_FUND_INVESTED	VARCHAR2(16)	Last Invested Fund
DAYS_SINCE_LAST_INV	NUMBER	Days since last Investment
MEDIAN_NUMBER_OF_TXNCCY	NUMBER	Median number of Transaction Currency
MAX_NUMBER_OF_TXNCCY	NUMBER	Maximum number of Transaction Currency
MOST_INV_CCY	VARCHAR2(3)	Most Invested Currency
MOST_INV_CCY_COUNT	NUMBER	Most Invested Currency Count
RELATIONSHIPDURATION	NUMBER	Relationship Duration

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