

AA CORE

DAY 1

BASEL-standardized program for all the banks;

-different verticals with different modules;

-AA=different activity language;

-arrangement=contract between bank and customers;

-2 modules: **AA** and **silos**;

Why we move from silos to AA?

- 1) **Reusable**
- 2) **componentization**=split the applications into different components;

All the components are stored in repository.

- 3) **User definable**-bank can design its own products; there is no need for bank to code;
- 4) **Innovation**
- 5) **Scalable/upgrade** of AA
- 6) **Costs**
- 7) **Reverse and replay**-backward
- 8) **Simulation**-replicating the real time scenario/forward;
- 9) **External product-**
- 10) **Marketing catalog**

Modules in AA:

- 1) lending
- 2) deposits
- 3) accounts
- 4) rewards
- 5) agent-different channels where I can acquire the market
- 6) safe deposit box (lockers)
- 7) internet banking
- 8) mobile banking
- 9) proxy
- 10) others

7, 8, 9, 10-used for vertical channels

- 11) relationship pricing (CRM)
- 12) external products
- 13) bundles

Every field has a different feature.

Components=attributes plus actions.

Attributes=Fields.

Actions=behaviors; are hardcoded (cannot be changed).

Reusable component=can be used in multiple applications.

Each **product line** is a combination of mandatory and optional components/property classes:

- 1. accounts: 33 all, 6 mandatory;
- 2. agent: sourcing business; 25 all, 8 mandatory;
- 3. bundles: combination, combo's; interconnected components; 8 all, 3 mandatory;
- 4. deposits; 33 all, 9 mandatory;
- 5. internet services
- 6. lending; 36 all, 7 mandatory;
- 7. mobile services
- 8. other products
- 9. relationship pricing; 7 all, 3 mandatory;
- 10. proxy services
- 11. rewards
- 12. safe deposit box
- 13. external product

R18: new 2 **product line**→client consent, online services.

3 tier architecture:

- 1. Product line (AA.PRODUCT.LINE)
- 2. Product group (AA.PRODUCT.GROUP)
- 3. Product (AA.PRODUCT.DESIGNER)

3 ID's will be created when we are creating an arrangement:

-activity ID (AAA)

-arrangement ID (AA)

-if it is a financial-account number

2 fields are mandatory:

-customer id and

-currency.

-hyperlinks in AA=properties

Property=instances or copies of the property class

Product condition=defining default values for property class attributes, *if this values possible to amend/edit with “what restriction” means (negotiation rules →change the default values at AA level, with what restriction);*

Product condition:

-default values;

-modify or negotiation rules;

-period rules=controlling the property class attributes with time element;

Ex. Default 25 lending term, but it can be edited to 15 y

AAACT17107J08C6P53

AA17107KGW1P

DAY 2

RECAP DAY 1:

Components? Attributes and actions.

Attributes=features

Actions=behaviors

What you can find in the product line? Mandatory and optional property classes.

3 tier architecture? Product line, product group and product designer

What is the product condition? Defining default values for property class attributes.

What is property? Instances/copies of the property class

Where we can find property class attributes? AA.PRD.DES<PROPERTYCLASS>

BUILDING BLOCKS

A component having attributes and actions is called **property class** in AA.

Ex. Vehicle components, banking product components

Wheel-property class

Front wheel, rear wheel-property

Type, radius-product conditions

Name type/copy of a property class is known as a **property** in AA.

Client can create new properties of existing property classes. Property classes can only be created by Temenos.

3 rules for 3 tier architecture

Product line → property class

Product group → property

Product designer → product condition

Properties have the same attributes as their property class. No more and no less. Hence can only do the same actions.

(Ex of diff product lines: loans, deposits, accounts)

Ex of diff property classes for loan product line: interest, term amount, charges)

Each property must have a product condition assigned to it.

Quiz 1

1) Which of the following is true in AA?

- a. A product is an assembly of product conditions-TRUE**
- b. Product lines are designable by clients-FALSE
- c. Product groups can be designed by Temenos-FALSE

2) What is a product condition?

- a. It assigns values to attributes of a product group
- b. It assigns values to attributes of a property class-TRUE**
- c. It assigns values to attributes of a product line

3) Where can a property be set as mandatory or optional?

- a. In product group-TRUE**
- b. In product
- c. In product line

4) Where are attributes and actions defined?

- a. In every property class-TRUE**
- b. In every product group
- c. In every property

5) What is an attribute?

- a) Common condition used for every product line
- b) Common features defined for every property class -TRUE**
- c) Common functionality defined in every product group

6) Where are property classes set as mandatory or optional?

a) Product line-TRUE

b) Product

c) Product group

Arrangements and Product Hierarchy

Parent and child product.

-only one parent;

-parent and child must be from the same group;

-child condition will proceed;

From Parent→more child's

Ex. 1 Current Account à Parent

Current Account : >18 ; commission / balance è **Child 1**

Salary Account: salary ~ monthly credit of the account è **Child 2**

Current Account + Debit card attached: debit card è **Child 2**

Ex. 2 Of inheritance hierarchy: Current account template→Current account

→Current account salary

→Current account debit

A product can be either SALEABLE or for INHERITANCE ONLY.

All mandatory properties must have a condition INHERITANCE SALEABLE (CORRECT)

If it is SALEABLE, it will be available in product catalog. In INHERITANCE it will not be available.

Create an arrangement=available in SALEABLE. For INHERITANCE we cannot create an arrangement.

Inheritance only YES for INHERITANCE, NO for SALEABLE.

Passing conditions to next level-available both for INHERITANCE and SALEABLE too.

Arrangement=instance of a product for a customer. Product conditions could be negotiated with customer, if allowed.

Quiz 2

1) A saleable product can be a Parent-TRUE

2) What is the use of negotiations rules?

a) User can set whether the property defined at product level can be viewed or edited at arrangement level

- b) **User can control the modification of attribute value in arrangements-TRUE**
- c) User can control multiple use of property classes in product
- 3) **Which of the following is true about the characteristics of a product?**
 - a) **A product can be set as for inheritance only as well as saleable-TRUE**
 - b) A product can have more than one parent
 - c) A product can either be set as saleable or for inheritance only and not both

Product builder and catalog

Types of property. Class (AA.PROPERTY.CLASS):

1. **Dated**
2. **Currency**
3. **Currency optional**
4. **Forward dating**
5. **Multiple**
6. **Variations supported**-info will be changed depending on the channel (ex. Interest different for term deposit opened in branch versus internet banking versus mobile banking)
7. **Merging**
8. **Trigger**-will appear only after validate/commit
9. **Arrangement**
10. **tracking facility:**
 - a. **tracking only:** changes on the product level will have impact only for arrangements that are specified by user
 - b. **non tracking:** changes on the product level will have impact only for arrangements that are made starting with the date of change ; the user will have to input at AA level every day;
 - c. **Tracking:** changes on the product level will have impact on all arrangements; giving control to the user (options: tracking, non-tracking, custom tracking)
11. **balance prefixes**
 - a. ACC
 - b. DUE
 - c. DEF
 - d. PAY
 - e. AGE
 - f. RES
 - g. CUR
 - h. TOT
 - i. EXP
 - j. UNC

Product condition key can have 4 components:

1. Name

2. Currency-it is used whenever my property class is currency; mandatory;
3. Variation
4. Dated

If the given property class is dated, then the property conditions will be dated.

.....is currency optional, then the property conditions can be left blank.

.....is currency, what is the effect? The product condition key name it will be CURRENCY.

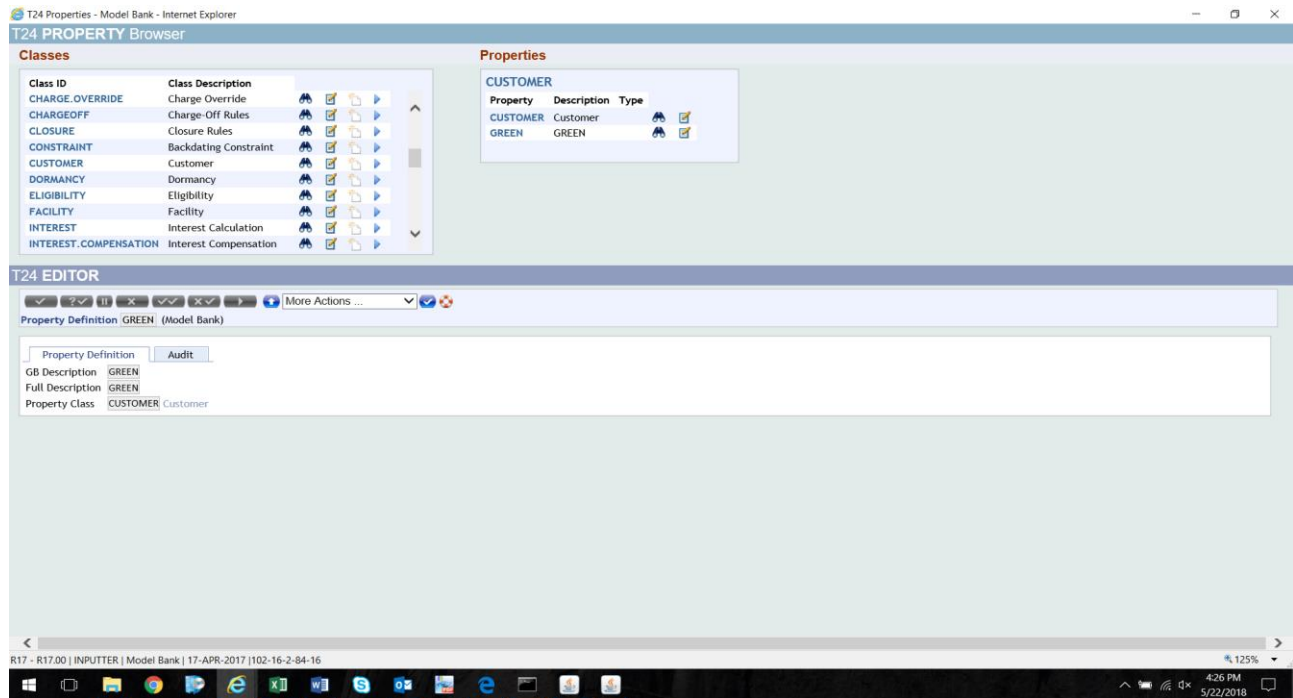
Either the user can enter this currency, it will be defaulted by local currency table.

Triggered property will be displayed at the AA level after validates or commit.

AA.PROPERTY.CLASS.ACTION=details actions that can be performed with a property class

Types of properties:

1. Suspend=stop booking revenue to P&L;
2. Suspend overdues=past and current overdues are suspended; will never come independently; will always come with suspend;
3. Credit=property is payable to customer (ex. Bonus)
4. Commission=remuneration payed to agents;
5. Rewards=loyalty points/programs;
6. Residual accrual=accrued amount higher than the due amount;
7. Rebate unamortized=only for insurances;
8. Accrue by bill=split accruals on bills, book every month accrual;
9. Variations supported=linked with property class and product condition variation;
10. Forward dating
11. Product only=whenever property class tracking only, then property type will be mark as product only
12. Blank=property class is blank, no functionality;



Workshop 3-creation of customer property

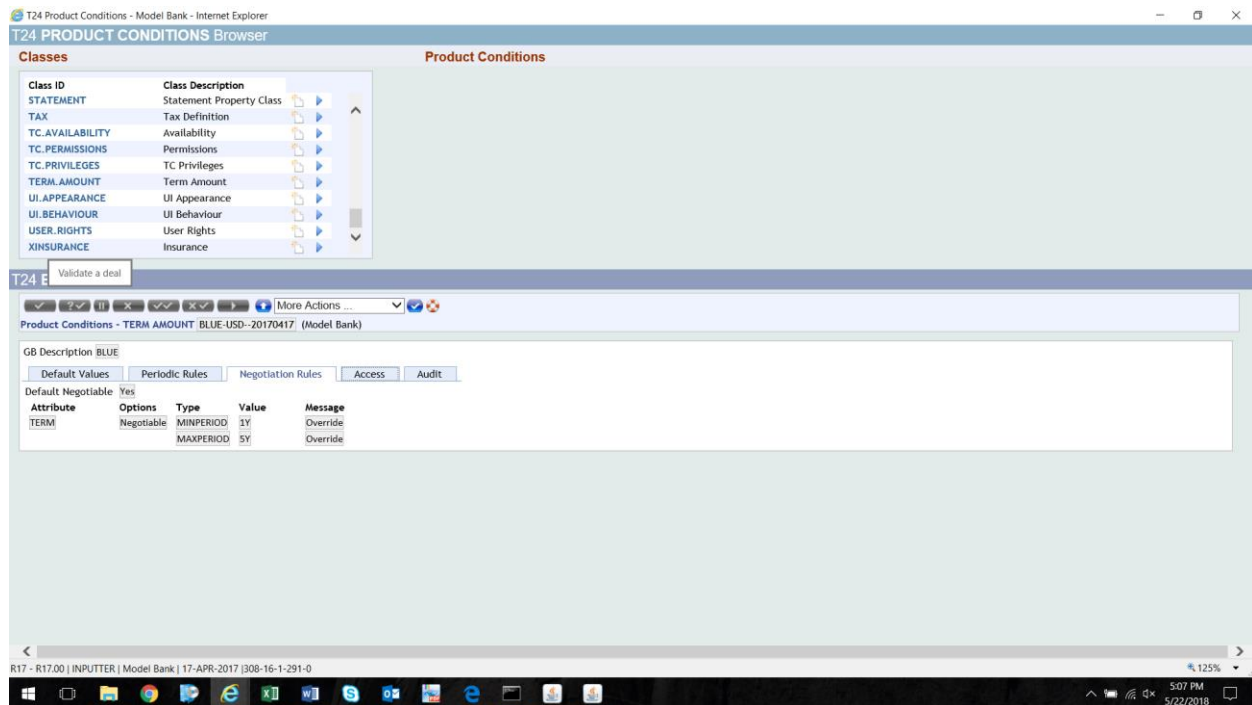
Variation is created in a virtual table: **EB.LOOKUP**, and next **AA.PRODUCT.VARIATION**

ACCHG-USD-BRANCH-20100101 (name/currency/variation/dated)

ACCHG---CALLCENTRE-20100101 (Name/currency optional/variation/dated)

ACCHG-USD--20100101 (Name/currency/variation optional/dated)

ACCHG---20100101 (Name/currency optional/variation optional/dated)



Workshop 4-creation of a term amount product condition

Quiz 3

- 1) **What is the effective date in a product condition?**
 - a. Date on which product condition was created
 - b. Date on which the product condition values take effect for a product-TRUE**
 - c. Date on which the product will be available for sale

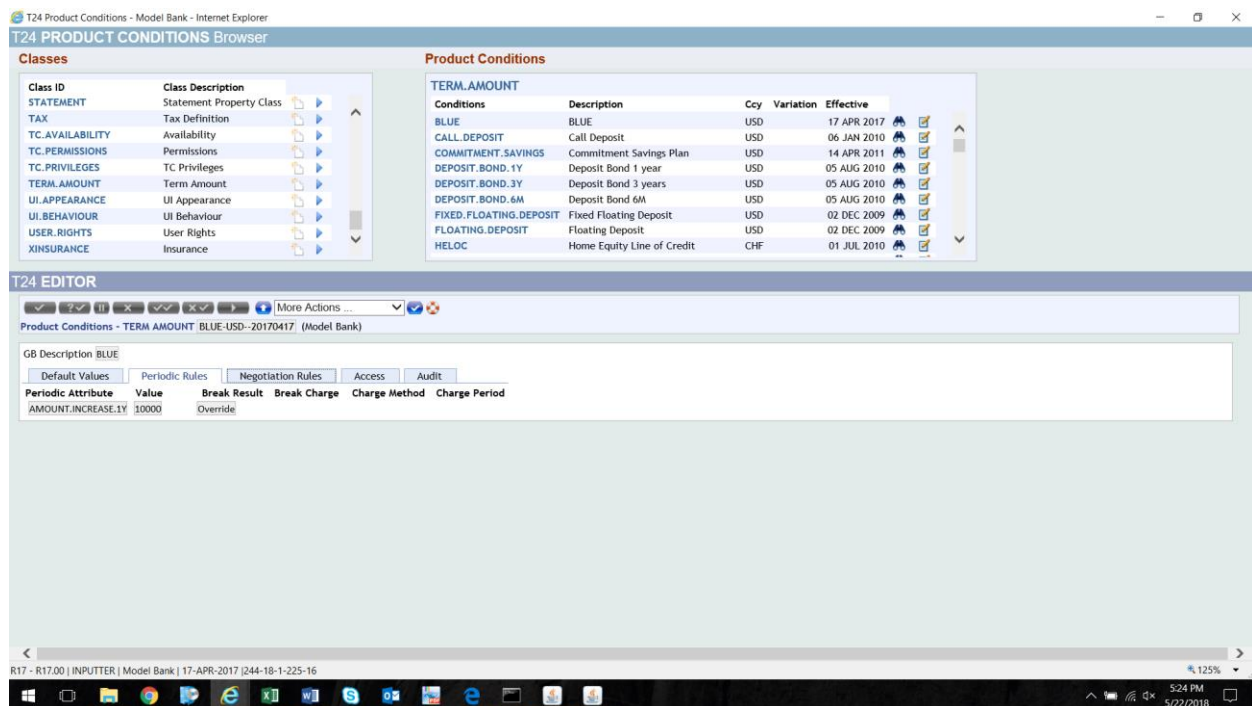
- 2) **Which of the following is a comparison type for amount data type?**
 - a. Like
 - b. Basis point
 - c. Maximum**

- 3) **Which of the following is true about negotiation rule options?**
 - a. It can be both non-negotiable and override
 - b. It can be both negotiable and override**
 - c. It can be both negotiable and non-negotiable

Periodic rules-control the property class attributes with a time element

Repeating-calendar year

Rolling-at the anniversary of a certain period for the product taken



Workshop 6-periodic rules

DAY 3

RECAP DAY 2

1. In which application can we find that given property class has been given as mandatory?
AA.PRODUCT.LINE
2. At any given point, how many product conditions are applicable for a property of an arrangement? Only one
3. What is the truth about currency specific product condition?

If the Property Class is Currency the effect is, the Product Condition Name will pick the value from Company Table

4. A user has created a new property to be used in a product. Where should the user attach it the property? AA.PRODUCT.GROUP
5. Which product lines are not predefined by Temenos? All product lines are predefined by Temenos.
6. A property can be hidden to prevent the user by modifying ... How is this achievable?
PRODUCT.ONLY
7. A bank wish to offer a preferential deposit product commitment amount 10.000 USDhow can be specified? DEFAULT value and NON-NEGOTIABLE
8. For charges and interest-additional product conditions applicable in the future? The PROPERTY.CLASS must be dated
9. What is the effective date?

10. A charge property type set as CREDIT? What is the meaning of credit? Charge payable to customer
11. The account property class is defined as mandatory in lending product line. What effect does it have in prod group? Also mandatory
12. A user would like to include a new property of a property class in a product. The product already contains another property of the same property class which attribute controls whether this is possible?
Answer: Property class type filed must be set to multiple.
13. A property needs to be defined as part of the products but should not be visible to user at the arrangement not should do any activity be allowed for this property. How can this be achieved?
Answer: Set PROPERTY.TYPE filed for a property to PRODUCT ONLY
14. Say 20 may 2014 is the start date of loan, bank wants to give rolling and 1 y, what is the valuation date or evaluation date?
Answer: 20 may 2014 to 20 may 2015

Activity in AA=anything except enquiry; table name: **AA.ACTIVITY CLASS**=PRODUCT LINE plus PROCESS plus PROPERTY CLASS; **AA.ACTIVITY**=PRODUCT LINE plus PROCESS plus PROPERTY

AC.BALANCE TYPE=sub coded (hardcoded prefix plus property)

Where we do find a basic shape of the product? At AA.PRODUCT.GROUP level.

Currency (line attribute) =arrangements financial (related to amount) and non-financial. If the currency appear in line attributes → then the arrangements/product lines are financial.

Financial services:-Account;

- agent;
- deposits;
- lending;
- rewards;
- safe deposit box;
- external products.

Non-financial services:

- bundles;
- internet services;
- mobile services;
- other products;

-relationship pricings;

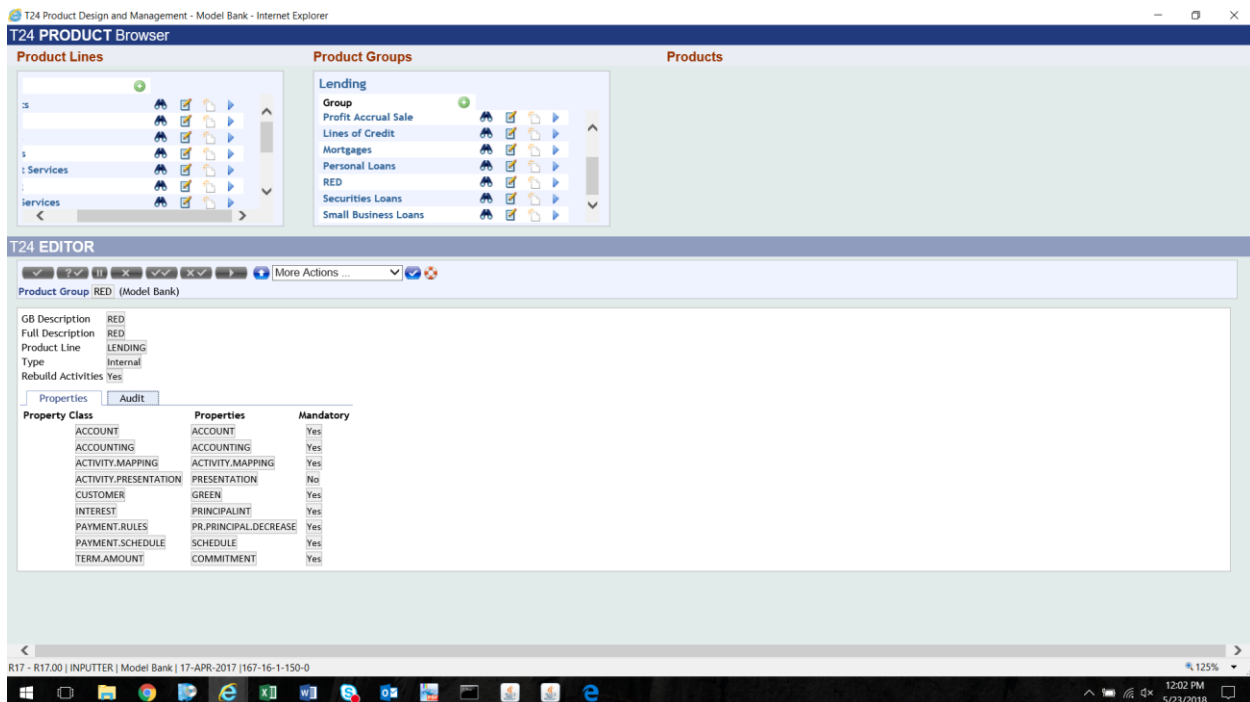
-proxy;

Replay (line attribute) =used for reverse and replay functionality; only if it mentioned in line attribute, we can perform it;

Single (line attribute) =user can create only one arrangement per customer (ex. Customer can be a silver customer or gold customer, never multiple/both of them);

AA.PRODUCT.GROUP attributes:

1. **Product line:** respective product line
2. **Type:**
 - a. None
 - b. External-used for comparison
 - c. Internal-for selling purposes
3. **Attribute :** grouping purposes
4. **Rebuild activities:**
 - a. Yes: activities will be created automatically by the system in AA.ACTIVITY
 - b. No: it will not be created automatically



Workshop 8-creation of a new product group

Base:

- a. Left blank→arrangement

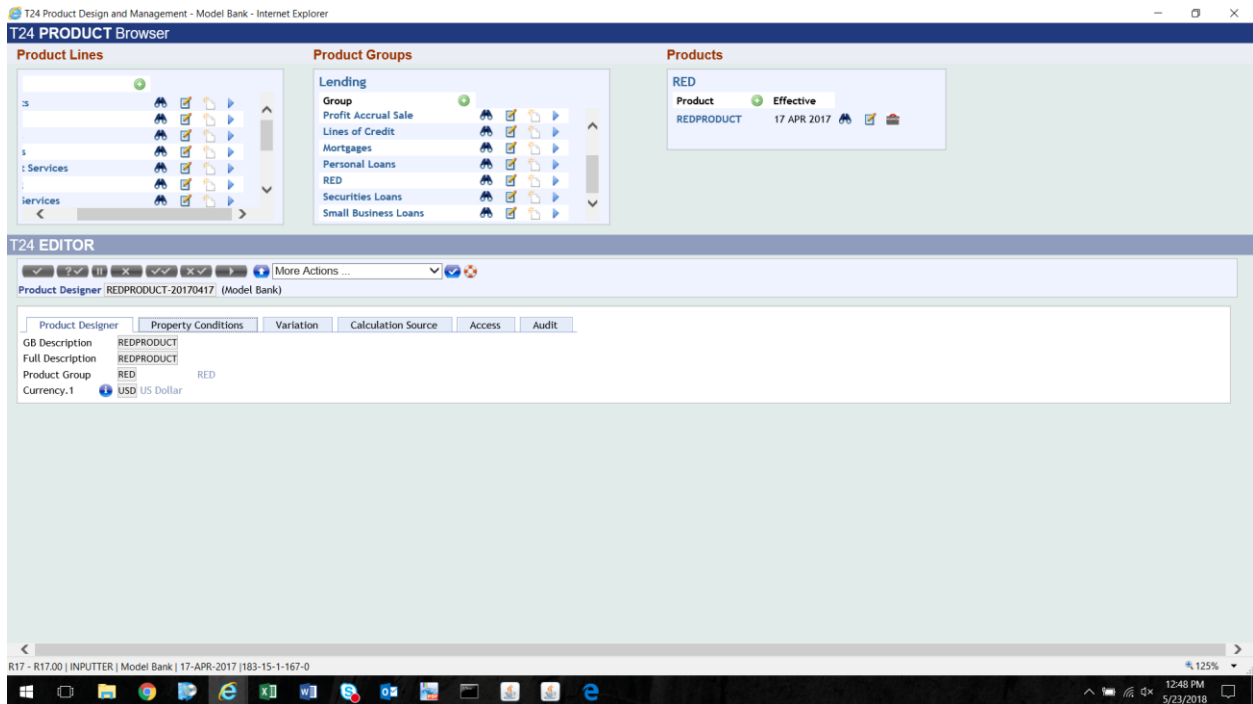
- b. Start
- c. Anniversary

Quiz 4

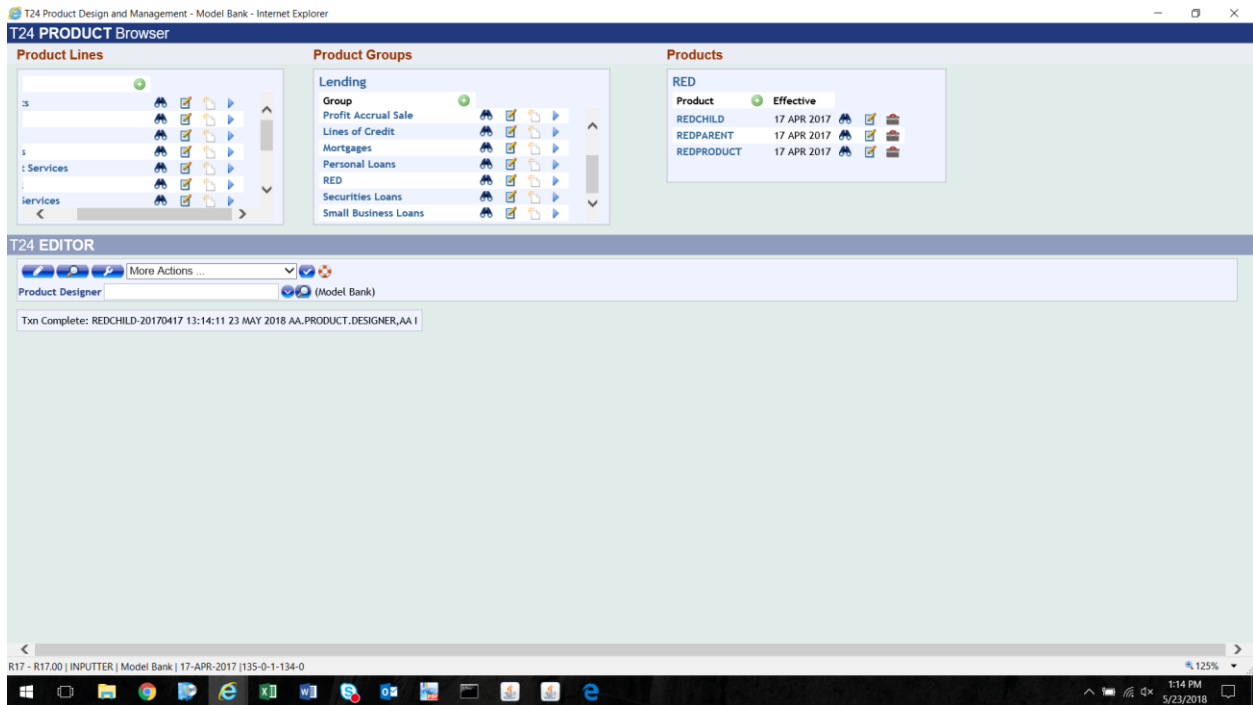
1. Which of the following statements is true?

- a. A product can be set as as inheritance only and a saleable product-FALSE
 - b. A parent product can have only one child product-FALSE
 - c. **A saleable product can be set as a parent product-TRUE**
2. 2-C

3-B



Workshop 9-creation of a lending product



Workshop 10 and 11

Quiz 5

1. **Which of the following is true about proofing and publishing?**
 - a. Proof parent and child to add a child to catalog
 - b. When a child product is proofed and published, its parent is also automatically proofed
 - c. **Proof first and then publish-TRUE**
2. **When is a product made available for sale?**
 - a. When it is dully and published
 - b. **From the indicated available date after due publishing-TRUE**
 - c. When it is dully proofed
3. **How can a product can be withdrawn from further sale?**
 - a. By deleting the product conditions
 - b. **By indicating the expiry date-TRUE**
 - c. By deleting the product

Proof and publishing (table: AA.PRODUCT.MANAGER)

AA.PR.DES <PROPERTY CLASS>

Available date: mandatory.

Ex 1. Product available date: 2018.01.01

Condition 1=2018.01.15

Condition 2=2018.03.31

You cannot proof because the conditions are missing.

Ex 2. Condition 1=2017.12.01

Condition 2=2018.03.01

Product available date: 2018.01.01

You can proof because at least 1 condition it

Lending Overview (Unauthorised) - Model Bank - Internet Explorer

Arrangement Overview - Lending (Unauthorised)

Arrangement AA17107C2BPW **Account** 84638 - USD
Product Mortgage **Arrangement Date** 17 APR 2017
Beneficial Owner Harry Crisp **Status** Unauthorised

Arrangement Conditions

Basic **Additional**

Account Static
Title Mortgage Loan

Commitment
Amount 100,000.00
Term 25Y

Penalty Interest
Single Rate Variable 11% (Loan Base Rate + 3.50%)
Principal Interest
Single Rate Periodic 5% (USD Disc Rates + 0.50%)

Schedule
Disburse Percentage Account 100% Payment on the Start Date
Constant Repayment Account 584.81 Due Monthly
Principal Interest

Account Details

Financial Summary
Commitment (Total) 100,000.00
Total Principal 100,000.00

Account Dates
Start Date 17 APR 2017
Cooling Date 24 APR 2017
Effective Date 17 APR 2017
Next Payment 17 MAY 2017
Maturity Date 17 APR 2042
matures in 25 Years

Additional Details

Activity **Bills** **Schedule**

Pending Approval
Date Activity Type Txn Amt Pending
17 APR 2017 New Arrangement User Input

Activity Log

Full **Financial** **User** **System** **Saved Activities** **History**

Results 1 - 5 of 11

All Activities

Date	Activity	Type	Txn Amt	Status
17 APR 2017	New Arrangement	User		
	---Issue Bill (New Arrangement Fee)	2nd		
	---New Arrangement Fee Due	2nd		
	---Settle via Instructions	Txn		
	---Apply Repayment	Txn	500.00	

R17 - R17.00 | AUTHORISER | Model Bank | 17-APR-2017 | 134-1-1-132-0

Workshop 13-creation of a lending arrangement

AA17107C2BPW

AAACT171078ZBX36NT

AAACT171078ZE

84638

Activities can be launched in 5 ways:

1. By user
2. By system (COB)
3. Secondary (trigger)
4. Non AA Application (FT, TT, PP)
5. OFS

Payment schedule are not stored anywhere, there are no file runtime enquiry!!!

Virtual balances=sum of selected balances

Rebuild activity=activities are created automatically