Week 9 Assignments

Day 1:

Scenario:

For Example, you are working on a Salesforce project where you need to **create multiple related records and New Task automatically** when an Account is created.

When a new **Account** of type "*Business*" is created, you need to:

- Automatically create 3 default Contacts (e.g., Sales Manager, Support Lead, Finance Officer).
- Automatically create a "Welcome Task" assigned to the Account Owner.

Why Flows aren't enough:
 Flows can create a few related records easily, but:

- They might fail if bulk data is inserted (e.g: via Data Loader).
- Complex logic with loops and conditions is easier and more maintainable in Apex.

Why Apex is better:
 Apex handles **bulk operations**, has **good control over logic**, and can be **reused**.

Day 2:

Q1:

- **NONE:** No debug information is logged. This is the default and is useful in production environments to minimize overhead.
- **ERROR:** Only error messages and system-generated errors are logged.
- **WARN:** Logs warnings, errors, and system-generated messages.
- **INFO:** Logs informational messages, warnings, errors, and system-generated messages.
- **DEBUG:** Adds debug-level messages, including information about variable values and method calls. This is often used for troubleshooting specific code issues.
- **FINE:** A higher level of logging than DEBUG.
- **FINER:** A higher level of logging than FINE.

- **FINEST:** The most detailed logging level available, providing the highest level of granularity for debugging. Be cautious with this level, as it can significantly impact performance.

Created a simple Example Apex Class:

Class Name: DebugLevelExample.apxc

Q2: Implement the above identified scenarios through Apex Code.

Apex Class –> week9TaskAccountTrigger.apxc

Object: Account

Account id: 001gL00000TMISIQA5

- Create **3 default Contacts** related to that Account:
- Sales Manager
- Support Lead
- Finance Officer
- Create a **Task** titled "Welcome Task" assigned to the **Account Owner**.

Day3:

1. **Write an SOQL query to get all the Accounts of Type='Business' from the Contact Object.**
   - Added new picklist value where Industry = 'Bussiness'

SOQL Query:

=> select id, name, Account.name, Account.Industry from contact where Account.Industry='Bussiness'

Result Contact Id: 003gL00000GY8gHQAT

2. **Write an SOQL query to fetch all the plans for each Service.**

    select Opportunity.Id,
        Opportunity.Name,
        Opportunity.Account.Name,
        PricebookEntry.Product2.Id,
        PricebookEntry.Product2.Name,
        PricebookEntry.Product2.ProductCode,
        PricebookEntry.Pricebook2.Name,
        PricebookEntry.UnitPrice,
        Quantity,
        TotalPrice
    FROM OpportunityLineItem
    WHERE Opportunity.Id != NULL
    ORDER BY Opportunity.Name

Apex Class: week9AllActivePlanServices.apxc

43	USER_DEBUG	[20]|DEBUG|===== All Service Plans =====
46	USER_DEBUG	[22]|DEBUG|Service (Opportunity): FInal Opps Tech	Account: TechCorp	Plan: Basic 100 Mbps Plan	Pricebook: IMS Pricebook	Unit Price: 799.00	Qty: 10.00	Total: 7990.00
46	USER_DEBUG	[22]|DEBUG|Service (Opportunity): FInal Opps Tech	Account: TechCorp	Plan: Basic 50 Mbps Plan	Pricebook: IMS Pricebook	Unit Price: 499.00	Qty: 10.00	Total: 4990.00
47	USER_DEBUG	[22]|DEBUG|Service (Opportunity): New Bulk routers	Account: ABC Corp	Plan: Diamond 1 Gbps Plan	Pricebook: IMS Pricebook	Unit Price: 3999.00	Qty: 100.00	Total: 399900.00
47	USER_DEBUG	[22]|DEBUG|Service (Opportunity): New Bulk routers	Account: ABC Corp	Plan: Premium 750 Mbps Plan	Pricebook: IMS Pricebook	Unit Price: 2499.00	Qty: 10.00	Total: 24990.00
48	USER_DEBUG	[22]|DEBUG|Service (Opportunity): New Bulk routers	Account: ABC Corp	Plan: Diamond Unlimited Plan	Pricebook: IMS Pricebook	Unit Price: 5999.00	Qty: 5.00	Total: 29995.00
48	USER_DEBUG	[22]|DEBUG|Service (Opportunity): Opp trigger before update 2	Account: null	Plan: Diamond 1 Gbps Plan	Pricebook: IMS Pricebook	Unit Price: 3999.00	Qty: 50.00	Total: 199950.00
49	USER_DEBUG	[22]|DEBUG|Service (Opportunity): Priya	Account: Priya Enterprises	Plan: Diamond Unlimited Plan	Pricebook: IMS Pricebook	Unit Price: 5999.00	Qty: 5.00	Total: 29995.00
49	USER_DEBUG	[22]|DEBUG|Service (Opportunity): Priya	Account: Priya Enterprises	Plan: Basic 100 Mbps Plan	Pricebook: IMS Pricebook	Unit Price: 799.00	Qty: 5.00	Total: 3995.00
49	USER_DEBUG	[22]|DEBUG|Service (Opportunity): Priya	Account: Priya Enterprises	Plan: Premium 750 Mbps Plan	Pricebook: IMS Pricebook	Unit Price: 2499.00	Qty: 10.00	Total: 24990.00
50	USER_DEBUG	[22]|DEBUG|Service (Opportunity): Telecom-	Account: Telecom	Plan: Premium 750 Mbps Plan	Pricebook: IMS Pricebook	Unit Price: 2499.00	Qty: 2.00	Total: 4998.00

Apex Class: AllAccountOppsPlansList.apxc

All accounts and associated opportunities

:17:11:061	USER_DEBUG	[51]|DEBUG|Account: ABC Corp
:17:11:061	USER_DEBUG	[52]|DEBUG|--------------------------------------
:17:11:061	USER_DEBUG	[54]|DEBUG|Opportunity: New Bulk routers	Stage: Closed Won	Pricebook: IMS Pricebook	Plan: Diamond 1 Gbps Plan	Active: true	UnitPrice: 3999.00	Total: 399900.00
:17:11:061	USER_DEBUG	[54]|DEBUG|Opportunity: New Bulk routers	Stage: Closed Won	Pricebook: IMS Pricebook	Plan: Diamond Unlimited Plan	Active: true	UnitPrice: 5999.00	Total: 29995.00
:17:11:061	USER_DEBUG	[54]|DEBUG|Opportunity: New Bulk routers	Stage: Closed Won	Pricebook: IMS Pricebook	Plan: Premium 750 Mbps Plan	Active: true	UnitPrice: 2499.00	Total: 24990.00
:17:11:061	USER_DEBUG	[50]|DEBUG|====================================
:17:11:061	USER_DEBUG	[51]|DEBUG|Account: Priya Enterprises
:17:11:061	USER_DEBUG	[52]|DEBUG|--------------------------------------
:17:11:061	USER_DEBUG	[54]|DEBUG|Opportunity: Priya	Stage: Proposal/Price Quote	Pricebook: IMS Pricebook	Plan: Basic 100 Mbps Plan	Active: true	UnitPrice: 799.00	Total: 3995.00
:17:11:061	USER_DEBUG	[54]|DEBUG|Opportunity: Priya	Stage: Proposal/Price Quote	Pricebook: IMS Pricebook	Plan: Diamond Unlimited Plan	Active: true	UnitPrice: 5999.00	Total: 29995.00
:17:11:061	USER_DEBUG	[54]|DEBUG|Opportunity: Priya	Stage: Proposal/Price Quote	Pricebook: IMS Pricebook	Plan: Premium 750 Mbps Plan	Active: true	UnitPrice: 2499.00	Total: 24990.00
:17:11:061	USER_DEBUG	[50]|DEBUG|====================================
:17:11:061	USER_DEBUG	[51]|DEBUG|Account: TechCorp
:17:11:061	USER_DEBUG	[52]|DEBUG|--------------------------------------
:17:11:061	USER_DEBUG	[54]|DEBUG|Opportunity: FInal Opps Tech	Stage: Closed Won	Pricebook: IMS Pricebook	Plan: Basic 50 Mbps Plan	Active: true	UnitPrice: 499.00	Total: 4990.00
:17:11:061	USER_DEBUG	[54]|DEBUG|Opportunity: FInal Opps Tech	Stage: Closed Won	Pricebook: IMS Pricebook	Plan: Basic 100 Mbps Plan	Active: true	UnitPrice: 799.00	Total: 7990.00
:17:11:061	USER_DEBUG	[50]|DEBUG|====================================
:17:11:061	USER_DEBUG	[51]|DEBUG|Account: Telecom
:17:11:061	USER_DEBUG	[52]|DEBUG|--------------------------------------
:17:11:062	USER_DEBUG	[54]|DEBUG|Opportunity: Telecom-	Stage: Closed Won	Pricebook: IMS Pricebook	Plan: Premium 750 Mbps Plan	Active: true	UnitPrice: 2499.00	Total: 4998.00

Day 4:

Write a Trigger to store the current active plan on the Customer

Apex Handler Class: Week9ActivePlanHandlerDevice.apxc

Apex Trigger: Week9Task_iNetworkDeviceTriggerActive.apxt

Query: (Child -> Parent)

Where ***Account – Status: active***

& iNetwork_Device__c – Device Status: Active

SELECT Id, Name, Device_Status__c, Account__r.Id, Account__r.Name, Account__r.Status__c FROM iNetwork_Device__c WHERE Account__r.Status__c = 'Active'

Day 5:

Use proper context variables in the above-mentioned assignment

Apex Handler Class: Week9Task_PorperContextActivePlanHandler
Apex Trigger: Week9Task_PorperContextiNetworkDeviceTrigger