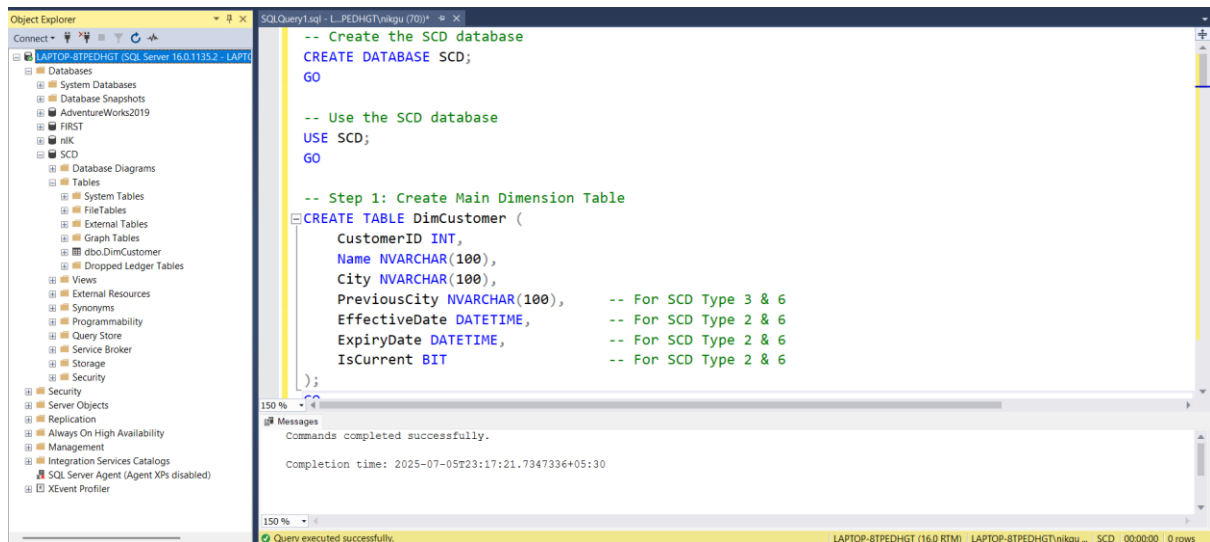


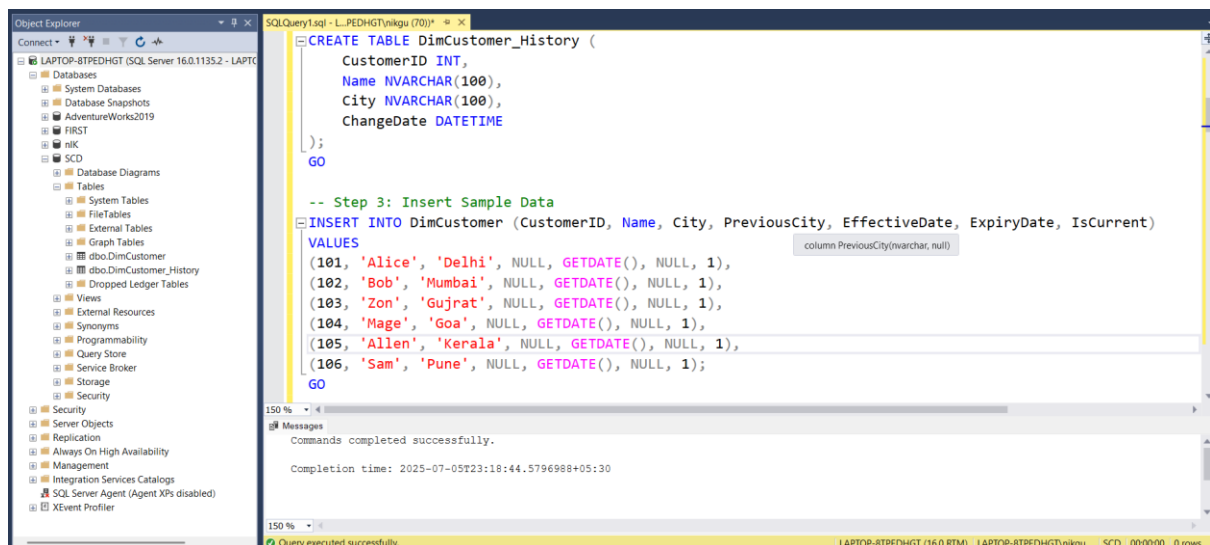
SCD Types SQL Server Solutions

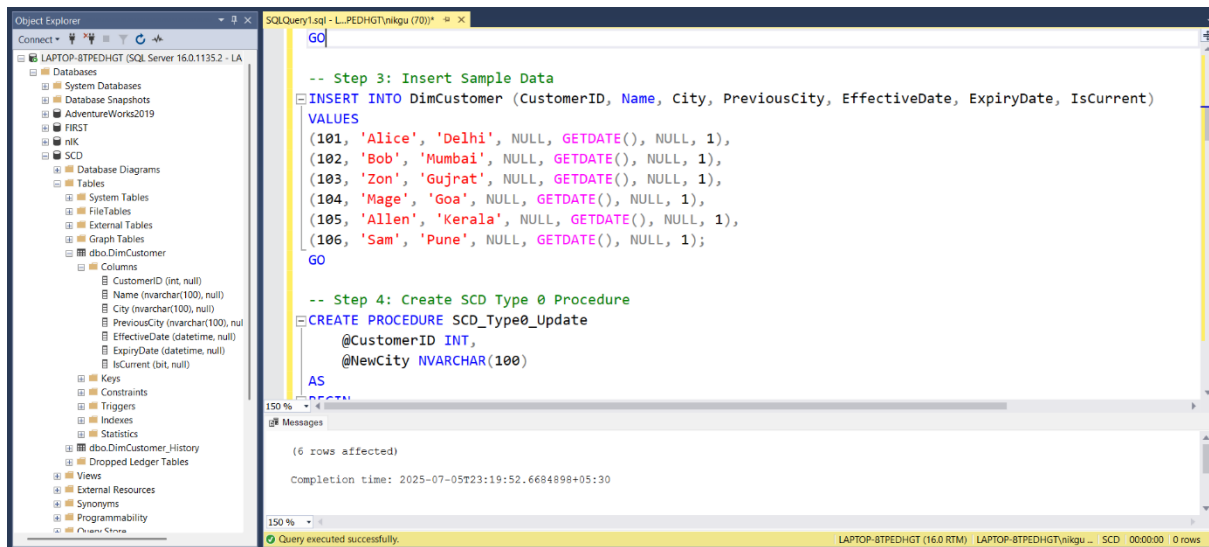
Screenshot 1: Database Creation



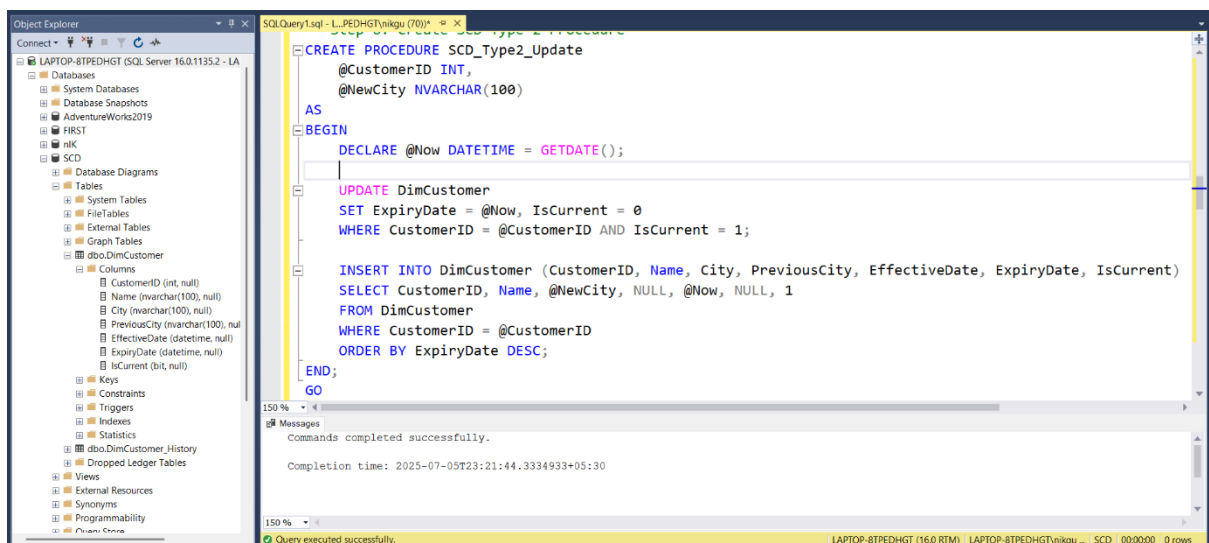
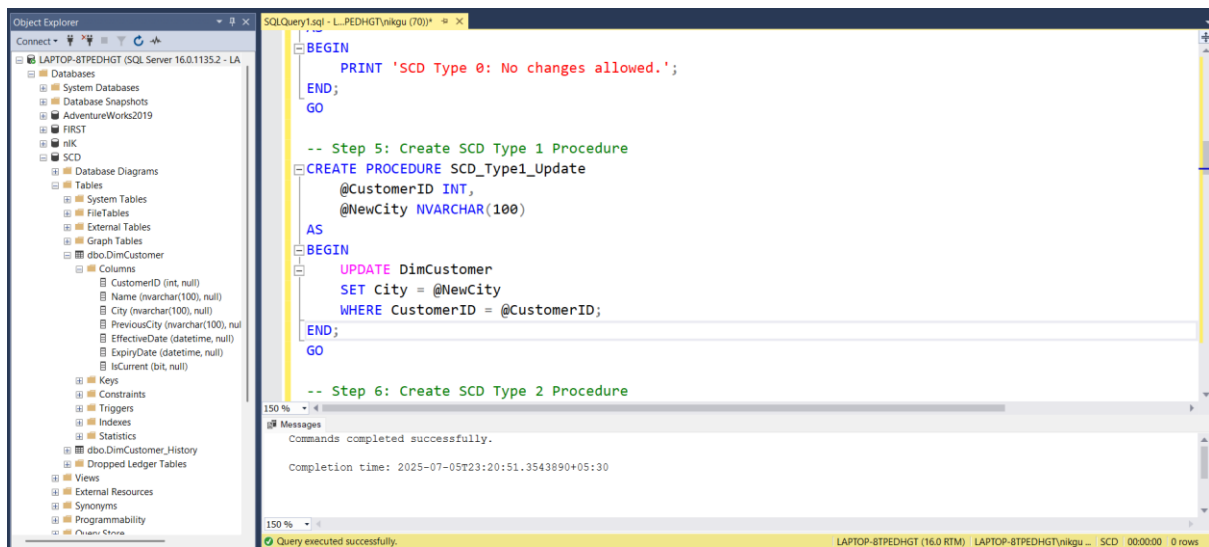
Screenshot 2: Sample Data Inserted

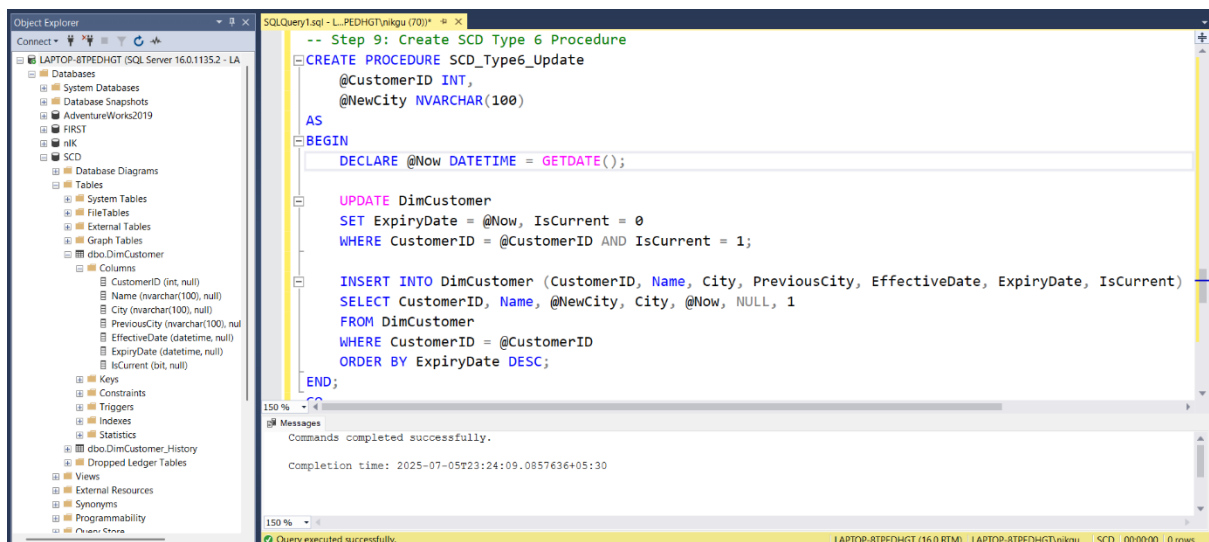
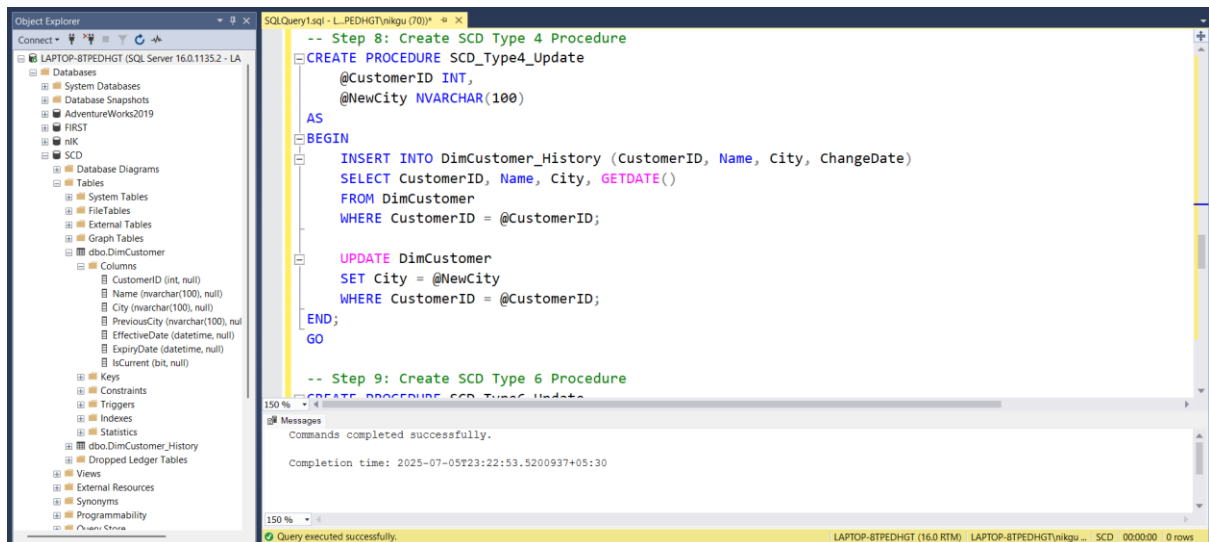
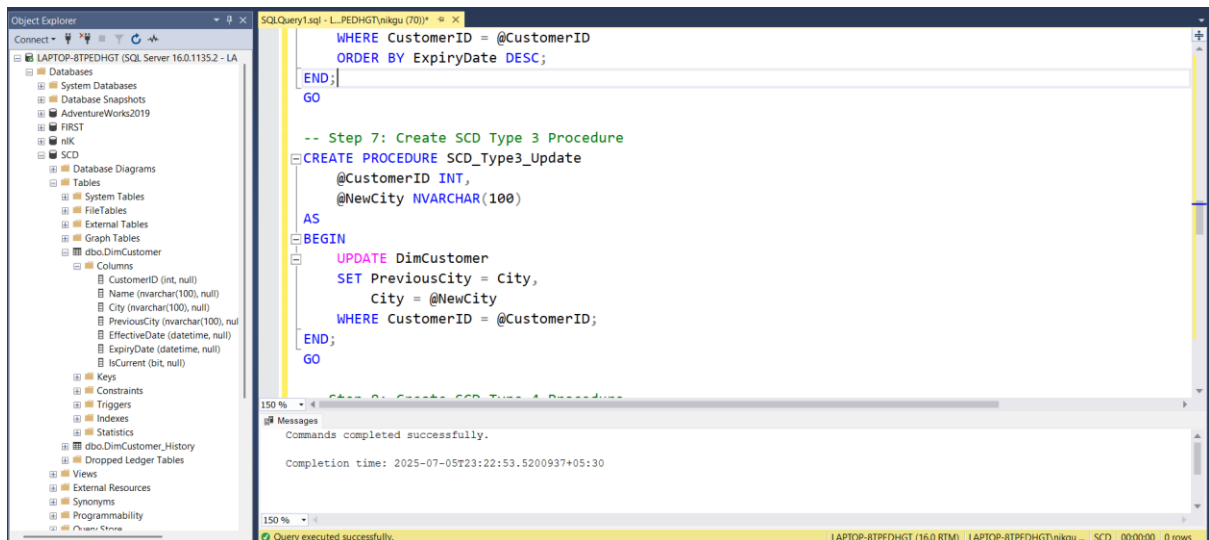
Figure 3 – Initial sample records inserted into the DimCustomer table for testing SCD operations.



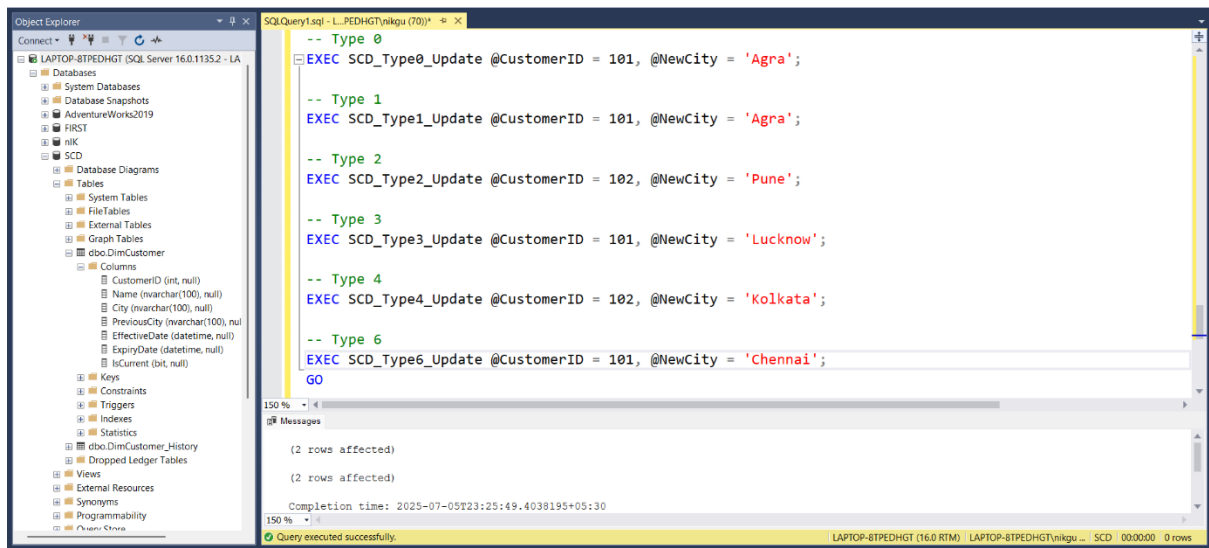


Screenshot 4: Stored Procedure Created (e.g. SCD Type 0, 1, 2, 4, 4, 6)



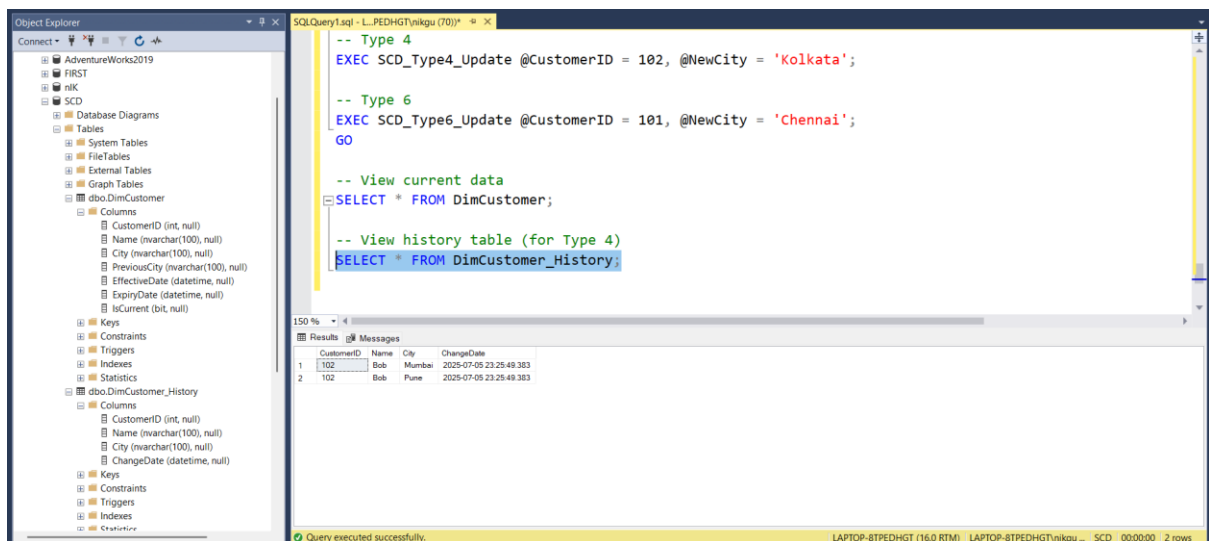


Screenshot 5: Procedure Execution



Screenshot 6: Final Data View

Figure 6 – Final state of DimCustomer and DimCustomer_History tables after executing all procedures.



Object Explorer

Connect

- AdventureWorks2019
 - FILESTREAM
 - ntfs
 - SCD
 - Database Diagrams
 - Tables
 - System Tables
 - FileTables
 - External Tables
 - Graph Tables
 - dbo.DimCustomer
 - Columns
 - CustomerID (int, null)
 - Name (nvarchar(100), null)
 - City (nvarchar(100), null)
 - PreviousCity (nvarchar(100), null)
 - EffectiveDate (datetime, null)
 - ExpiryDate (datetime, null)
 - IsCurrent (bit, null)
 - Keys
 - Constraints
 - Triggers
 - Indexes
 - Statistics
 - dbo.DimCustomer_History
 - Columns
 - CustomerID (int, null)
 - Name (nvarchar(100), null)
 - City (nvarchar(100), null)
 - ChangeDate (datetime, null)
 - Keys
 - Constraints
 - Triggers
 - Indexes
 - Statistics

SQLQuery1.sql - L_PEDHGT\nikgu (700)*

```
-- Type 4
EXEC SCD_Type4_Update @CustomerID = 102, @NewCity = 'Kolkata';

-- Type 6
EXEC SCD_Type6_Update @CustomerID = 101, @NewCity = 'Chennai';
GO

-- View current data
SELECT * FROM DimCustomer;

-- View history table (for Type 4)
SELECT * FROM DimCustomer_History;
```

150 %

Results Messages

	CustomerID	Name	City	PreviousCity	EffectiveDate	ExpiryDate	IsCurrent
1	101	Alice	Lucknow	Agra	2025-07-05 23:19:52.663	2025-07-05 23:26:13.570	0
2	102	Bob	Kolkata	NULL	2025-07-05 23:19:52.663	2025-07-05 23:25:27.800	0
3	103	Zon	Gujrat	NULL	2025-07-05 23:19:52.663	NULL	1
4	104	Mage	Osa	NULL	2025-07-05 23:19:52.663	NULL	1
5	105	Allen	Kerala	NULL	2025-07-05 23:19:52.663	NULL	1
6	106	Sara	Pune	NULL	2025-07-05 23:19:52.663	NULL	1
7	102	Bob	Kolkata	NULL	2025-07-05 23:25:27.800	NULL	1
8	101	Alice	Chennai	Lucknow	2025-07-05 23:26:13.570	NULL	1

Query executed successfully. LAPTOP-8TPEDHGT (16.0 RTM) LAPTOP-8TPEDHGT\nikgu... SCD 00:00:00 8 rows