**Exercise 1: Ranking and Window Functions**

create table Retail\_store(ProductID INT PRIMARY KEY,

ProductName varchar(100),Category varchar(100),

Price Decimal(10,2));

Insert into Retail\_store(ProductID,ProductName,Category,Price)

values (1, 'iPhone 15', 'Electronics', 999.99),

(2, 'Samsung Galaxy','Electronics', 899.99),

(3, 'MacBook Pro', 'Electronics', 1999.99),

(4, 'Sony Headphones','Electronics', 199.99),

(5, 'Lego Star Wars', 'Toys', 149.99),

(6, 'Barbie Dreamhouse', 'Toys', 199.99),

(7, 'Hot Wheels Set', 'Toys', 99.99),

(8, 'Drone X', 'Electronics', 499.99),

(9, 'PlayStation 5','Electronics', 499.99),

(10, 'Rubik’s Cube','Toys', 19.99),

(11, 'RC Car', 'Toys', 199.99);

select ProductId,ProductName,Category,Price, ROW\_NUMBER() OVER(PARTITION BY Category ORDER BY Price Desc) from Retail\_store;

insert into Retail\_store values(12,'Nokia','Electronics',899.99),

(13, 'GT Car', 'Toys', 199.99);

select ProductId,ProductName,Category,Price, RANK() OVER(PARTITION BY Category ORDER BY Price Desc) from Retail\_store;

select ProductId,ProductName,Category,Price, DENSE\_RANK() OVER(PARTITION BY Category ORDER BY Price Desc) from Retail\_store;





