

1. Tulis query untuk mendapatkan jumlah customer tiap bulan yang melakukan order pada tahun 1997.

```
select month(o.OrderDate) as Month, year(o.OrderDate) as Year, count(c.CustomerID) as
TotalCustomerEveryMonth
from dbo.Customers c
left join dbo.Orders o on c.CustomerID=o.CustomerID
where year(o.OrderDate)='1997'
group by month(o.OrderDate), year(o.OrderDate)
```

Hasil

	Month	Year	TotalCustomerEveryMonth
1	1	1997	33
2	2	1997	29
3	3	1997	30
4	4	1997	31
5	5	1997	32
6	6	1997	30
7	7	1997	33
8	8	1997	33
9	9	1997	37
10	10	1997	38
11	11	1997	34
12	12	1997	48

2. Tulis query untuk mendapatkan nama employee yang termasuk Sales Representative.

```
select FirstName+( ' ')+LastName as EmployeeName, Title
from dbo.Employees
where Title='Sales Representative'
```

Hasil

	EmployeeName	Title
1	Nancy Davolio	Sales Representative
2	Janet Leverling	Sales Representative
3	Margaret Peacock	Sales Representative
4	Michael Suyama	Sales Representative
5	Robert King	Sales Representative
6	Anne Dodsworth	Sales Representative

3. Tulis query untuk mendapatkan top 5 nama produk yang quantitynya paling banyak diorder pada bulan Januari 1997.

```
select top 5
p.ProductName, month(o.OrderDate) as Month, year(o.OrderDate) as Year,
sum(od.Quantity) as TotalOrder
from dbo.Products p
left join dbo.[Order Details] od on p.ProductID=od.ProductID
left join dbo.Orders o on od.OrderID=o.OrderID
where month(o.OrderDate)='1' and year(o.OrderDate)='1997'
group by p.ProductName, month(o.OrderDate), year(o.OrderDate)
```

Hasil

	ProductName	Month	Year	TotalOrder
1	Alice Mutton	1	1997	97
2	Aniseed Syrup	1	1997	50
3	Boston Crab Meat	1	1997	52
4	Camembert Pierrot	1	1997	60
5	Chai	1	1997	34

4. Tulis query untuk mendapatkan nama company yang melakukan order Chai pada bulan Juni 1997.

```
select c.CompanyName
from dbo.Customers c
left join dbo.Orders o on c.CustomerID=o.CustomerID
left join dbo.[Order Details] od on o.OrderID=od.OrderID
left join dbo.Products p on od.ProductID=p.ProductID
where p.ProductName='Chai' and year(o.OrderDate)='1997' and month(o.OrderDate)='6'
group by c.CompanyName
```

Hasil

	CompanyName
1	Tortuga Restaurante

5. Tulis query untuk mendapatkan jumlah OrderID yang pernah melakukan pembelian (unit\_price dikali quantity) <=100, 100<x<=250, 250<x<=500, dan >500.

Jumlah OrderID <=100

```
select count (OrderID) as 'TotalBuy<=100'
from dbo.[Order Details]
where UnitPrice * Quantity<=100
```

hasil

	TotalBuy<=100
1	351

Jumlah OrderID >500

```
select count (OrderID) as 'TotalBuy>500'
from dbo.[Order Details]
where UnitPrice * Quantity>500
```

hasil

	TotalBuy>500
1	800

100<=Jumlah OrderID <250

```
select count (OrderID) as '100<TotalBuy<=250'
from dbo.[Order Details]
where UnitPrice * Quantity>100
and UnitPrice * Quantity<=250
```

hasil

	100<TotalBuy<=250
1	472

250<=Jumlah OrderID <500

```
select count (OrderID) as '250<TotalBuy<=500'
from dbo.[Order Details]
where UnitPrice * Quantity>250
and UnitPrice * Quantity<=500
```

hasil

	250<TotalBuy<=500
1	532

6. Tulis query untuk mendapatkan Company name pada tabel customer yang melakukan pembelian di atas 500 pada tahun 1997.

```
select c.CompanyName, sum(od.Quantity) as TotalOrder
from dbo.Customers c
```

```

left join dbo.Orders o on c.CustomerID=o.CustomerID
left join dbo.[Order Details] od on o.OrderID=od.OrderID
where year(o.OrderDate)='1997'
group by c.CompanyName
having sum(od.Quantity)> 500
order by sum(od.Quantity) desc

```

Hasil

	CompanyName	TotalOrder
1	Save-a-lot Markets	2574
2	QUICK-Stop	2172
3	Ernst Handel	1950
4	Hungry Owl All-Night Grocers	799
5	Mère Paillard	750
6	HILARION-Abastos	650
7	Frankenversand	597
8	Wartian Herkku	550
9	Rattlesnake Canyon Grocery	540
10	Queen Cozinha	527
11	White Clover Markets	518

7. Tulis query untuk mendapatkan nama produk yang merupakan Top 5 sales tertinggi tiap bulan di tahun 1997.

```

select top 5
p.ProductName, sum(od.UnitPrice) * sum(od.Quantity) as TotalSales, month(o.OrderDate)
as Month
from dbo.Products p
left join dbo.[Order Details] od on p.ProductID=od.ProductID
left join dbo.Orders o on od.OrderID=o.OrderID
where year(o.OrderDate)='1997'
group by p.ProductName, month(o.OrderDate)
order by sum(od.UnitPrice) * sum(od.Quantity) desc

```

hasil

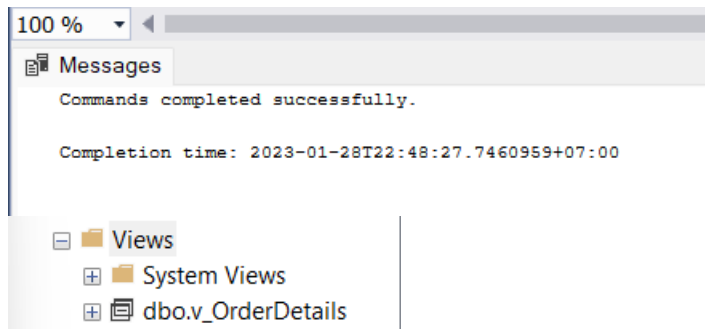
	ProductName	TotalSales	Month
1	Côte de Blaye	41738,40	1
2	Manjimup Dried Apples	39856,00	12
3	Thüringer Rostbratwurst	35651,52	12
4	Raclette Courdavault	28512,00	3
5	Raclette Courdavault	25575,00	11

8. Buatlah view untuk melihat Order Details yang berisi OrderID, ProductID, ProductName, UnitPrice, Quantity, Discount, Harga setelah diskon.

```

create view v_OrderDetails
as
select
    od.OrderID,
    od.ProductID,
    p.ProductName,
    od.UnitPrice,
    od.Quantity,
    od.Discount,
    od.UnitPrice - (od.Discount * od.UnitPrice) as FinalPrice
from dbo.[Order Details] od
left join dbo.Products p on od.ProductID=p.ProductID

```



9. Buatlah procedure Invoice untuk memanggil CustomerID, CustomerName/company name, OrderID, OrderDate, RequiredDate, ShippedDate jika terdapat inputan CustomerID tertentu.

```
create procedure Customer @CustomerID varchar(30)
as
select
    c.CustomerID,
    c.CompanyName,
    c.ContactName,
    o.OrderID,
    o.OrderDate,
    o.RequiredDate,
    o.ShippedDate
from dbo.Customers c
left join dbo.Orders o on c.CustomerID=o.CustomerID
where c.CustomerID = @CustomerID
```

	name	id	xtype	uid	info	status	base_schema_ver	replinfo	parent_obj
1	sp_upgraddiagrams	1845581613	P	1	0	0	0	0	0
2	sp_helpdiagrams	1909581841	P	1	0	0	0	0	0
3	sp_helpdiagramdefinition	1925581898	P	1	0	0	0	0	0
4	sp_creatediagram	1941581955	P	1	0	0	0	0	0
5	sp_renamediagram	1957582012	P	1	0	0	0	0	0
6	sp_alterdiagram	1973582069	P	1	0	0	0	0	0
7	sp_dropdiagram	1989582126	P	1	0	0	0	0	0
8	Customer	2069582411	P	1	0	0	0	0	0

```
exec Customer @CustomerID = 'ALFKI'
```

	CustomerID	CompanyName	ContactName	OrderID	OrderDate	RequiredDate	ShippedDate
1	ALFKI	Alfreds Futterkiste	Maria Anders	10643	1997-08-25 00:00:00.000	1997-09-22 00:00:00.000	1997-09-02 00:00:00.000
2	ALFKI	Alfreds Futterkiste	Maria Anders	10692	1997-10-03 00:00:00.000	1997-10-31 00:00:00.000	1997-10-13 00:00:00.000
3	ALFKI	Alfreds Futterkiste	Maria Anders	10702	1997-10-13 00:00:00.000	1997-11-24 00:00:00.000	1997-10-21 00:00:00.000
4	ALFKI	Alfreds Futterkiste	Maria Anders	10835	1998-01-15 00:00:00.000	1998-02-12 00:00:00.000	1998-01-21 00:00:00.000
5	ALFKI	Alfreds Futterkiste	Maria Anders	10952	1998-03-16 00:00:00.000	1998-04-27 00:00:00.000	1998-03-24 00:00:00.000
6	ALFKI	Alfreds Futterkiste	Maria Anders	11011	1998-04-09 00:00:00.000	1998-05-07 00:00:00.000	1998-04-13 00:00:00.000