

- 1.What is a primary key in a table?
- 2.Name the two types of table relationships in Power BI.
- 3.How do you create a relationship between two tables in Power BI?
- 4.What is a "star schema"?
- 5.Which table is typically the fact table in a sales dataset?
- 6.Link Sales.csv to Customers.csv using CustomerID (one-to-many).
- 7.Why is ProductID in Sales.csv a foreign key?
- 8.Fix a relationship error where ProductID has mismatched data types.
- 9.Explain why a star schema improves performance.
- 10.Add a new column TotalSales in Sales (Quantity \* Price from Products).
- 11.Optimize a model with circular relationships—how would you resolve it?
- 12.Create a role-playing dimension for OrderDate and ShipDate.
- 13.Handle a many-to-many relationship between Customers and Products.
- 14.Use bidirectional filtering sparingly—when is it appropriate?
- 15.Write DAX to enforce referential integrity if a CustomerID is deleted.

1.What is a primary key in a table?

**Primary key** — bu jadvaldagi **har bir satrni takrorlanmas tarzda aniqlovchi ustun**. Primary key faqat unique qiymatlarni qabul qiladi va null qabul qilmaydi.

2.Name the two types of table relationships in Power BI.

- 1.One to many
- 2.Many to many

3.How do you create a relationship between two tables in Power BI?

Power Bida Relationship yaratishning bir nechta yo'llari bor.

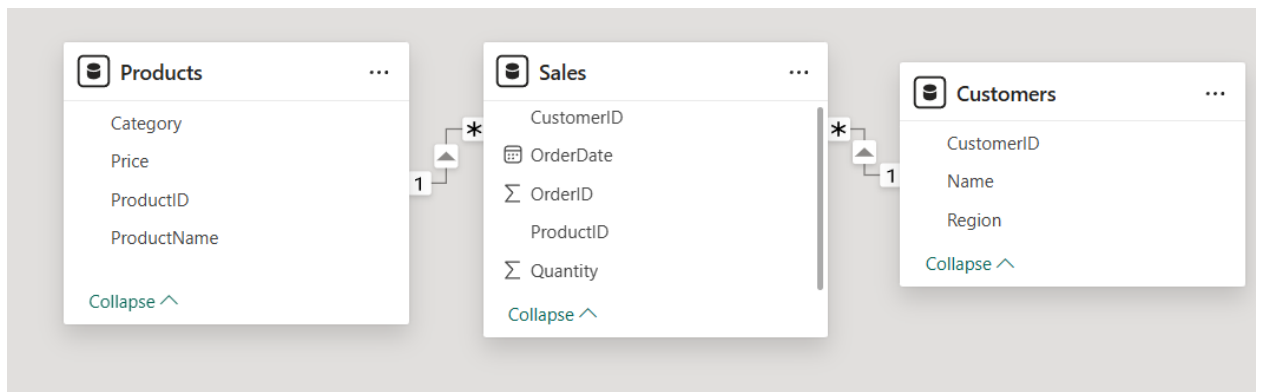
- 1.Drag and Drop- Kerakli columnni olamiz va relationship yaratmoqchi bo'lgan columnning ustiga tashlaymiz.
- 2."Model view"ga o'tib "Manage relationships" va "New relationship"ni bosamiz, kerakli columnlarni belgilaymiz va "Save"ni bosamiz

4.What is a "star schema"?

**Star schema** — bu ma'lumotlar modeli shakli. **Star schema** da markazda bitta Fact table va uning atrofida Dimension tablelar bo'ladi.

5.Which table is typically the fact table in a sales dataset?

Bu datasetda Sales Fact table hisoblanadi



7. Why is ProductID in Sales.csv a foreign key?

Chunki Products.csv da har bitta product bir marta kelishi mumkin. Lekin Sales.csv da Bitta mahsulotni ko'p marta order qilga bo'lishi mumkin.

8. Fix a relationship error where ProductID has mismatched data types.

Agar Products. ProductID va Sales. ProductID data typelari har xil bo'lsa bunday error kelib chiqadi. Uni tuzatish uchun Transform ga o'tib Data typelarini o'zgartirish kerak.

9. Explain why a star schema improves performance.

Fact table is Sales, Dimension tables are Products and Customers.

Star schemada Querylar tez bajariladi va DAX osonroq ishlaydi.

11. Optimize a model with circular relationships—how would you resolve it?

Uni resolve qilish uchun bitta relationshipni Inactive qilib qo'yaman

12. Create a role-playing dimension for OrderDate and ShipDate.

ShipDate yuq bo'lganligi uchun Products.Price va Sale.Price ni uladim

13. Handle a many-to-many relationship between Customers and Products.

Sales table bu yerda bridge table bo'lib turibdi. Shuning uchun Customers va Products many-to-many bo'lib turibdi.

14. Use bidirectional filtering sparingly—when is it appropriate?

Bidirectional filtering is appropriate **only in specific scenarios** where single-direction filtering is not enough to achieve correct and expected behavior in reports

