



DataBase | HW03
Fateme Nadi | 9636753

1

pgAdmin

File Object Tools Help

Browser

- product
- productcategory
- Columns
- Constraints
- Indexes
- RLS Policies
- Rules
- Triggers
- productcosthistory
- productdescription
- productdocument
- productinventory
- productlistpricehistory
- productmodel
- productmodelproductdescriptioncultu
- productphoto
- productproductphoto
- productreview
- productsubcategory
- scrapreason
- transactionhistory
- transactionhistoryarchive
- unitmeasure
- workorder

Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```
4 SC.ProductSubCategoryID as ProductSubCategory
5 ,
6 TransactionID,ReferenceOrderID,ReferenceOrderLineID ,
7 TransactionDate,TransactionType,Quantity,ActualCost
8 from production.product as P
9 JOIN production.transactionhistory as T ON(P.productid = T.productid)
10 JOIN production.productssubcategory as SC ON(P.ProductSubcategoryID = SC.ProductSubcategoryID)
11 JOIN production.productcategory as C ON(SC.ProductCategoryID = C.ProductCategoryID)
```

Data Output Explain Messages Notifications

CREATE VIEW

Query returned successfully in 122 msec.

pgAdmin

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Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```
1 select *
2 from V1
```

Data Output Explain Messages Notifications

	productname character varying (50)	productnumber character varying (25)	productcategory character varying (50)	productssubcategory integer	transactionid integer	referenceorderid integer	referenceorderlineid integer
1	Mountain-200 Black, 46	BK-M68B-46	Bikes		1	100000	41590
2	Road-250 Black, 48	BK-R89B-48	Bikes		2	100001	41591
3	Road-550-W Yellow, 38	BK-R64Y-38	Bikes		2	100002	41592
4	Road-550-W Yellow, 40	BK-R64Y-40	Bikes		2	100003	41593
5	Road-550-W Yellow, 42	BK-R64Y-42	Bikes		2	100004	41594
6	Road-550-W Yellow, 44	BK-R64Y-44	Bikes		2	100005	41595
7	Road-550-W Yellow, 48	BK-R64Y-48	Bikes		2	100006	41596
8	Touring-1000 Yellow, 46	BK-T79Y-46	Bikes		3	100007	41597
9	Touring-1000 Yellow, 50	BK-T79Y-50	Bikes		3	100008	41598
10	Touring-1000 Blue, 46	BK-T79U-46	Bikes		3	100009	41599
11	Touring-1000 Blue, 54	BK-T79U-54	Bikes		3	100010	41600
12	Touring-2000 Blue, 54	BK-T44U-54	Bikes		3	100011	41601
13	Road-350-W Yellow, 40	BK-R79Y-40	Bikes		2	100012	41602
14	Road-350-W Yellow, 42	BK-R79Y-42	Bikes		2	100013	41603

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Dashboard Properties SQL Statistics Dependencies Dependencies adventurework... adventureworks/postgres@PostgreSQL 12 *

adventureworks/postgres@PostgreSQL 12

Query Editor Query History

```
1 select name , salesorderid
2 from production.product LEFT OUTER JOIN Sales.salesorderdetail USING(ProductID)
```

Data Output Explain Messages Notifications

	name	salesorderid
	character varying (50)	integer
1	Mountain-100 Black, 42	43659
2	Mountain-100 Black, 44	43659
3	Mountain-100 Black, 48	43659
4	Mountain-100 Silver, 38	43659
5	Mountain-100 Silver, 42	43659
6	Mountain-100 Silver, 44	43659
7	Mountain-100 Silver, 48	43659
8	Long-Sleeve Logo Jersey, M	43659
9	Long-Sleeve Logo Jersey, XL	43659
10	Mountain Bike Socks, M	43659
11	AWC Logo Cap	43659
12	Sport-100 Helmet, Blue	43659
13	Road-650 Red, 44	43660
14	Road-650 Red, 50	43660

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 - workorder

Dashboard Properties SQL Statistics Dependencies Dependencies adventurework... adventureworks/postgres@PostgreSQL 12 *

adventureworks/postgres@PostgreSQL 12

Query Editor Query History

```
1 select name , salesorderid
2 from production.product LEFT OUTER JOIN Sales.salesorderdetail USING(ProductID)
3 where salesorderid is NULL
```

Data Output Explain Messages Notifications

	name	salesorderid
	character varying (50)	integer
1	Pinch Bolt	[null]
2	Lock Nut 2	[null]
3	Paint - Yellow	[null]
4	Lock Nut 3	[null]
5	Hex Nut 12	[null]
6	Head Tube	[null]
7	Thin-Jam Lock Nut 11	[null]
8	ML Road Seat Assembly	[null]
9	Hex Nut 19	[null]
10	Metal Sheet 5	[null]
11	Touring End Caps	[null]
12	Headlights - Dual-Beam	[null]
13	Thin-Jam Hex Nut 9	[null]

✓ Successfully run. Total query runtime: 222 msec. 238 rows affected.

.5

pgAdmin File Object Tools Help

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 - productphoto
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 - transactionhistoryarchive
 - unitmeasure
 - workorder

Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```

1 select SalesOrderID , SalesPersonID , SalesYTD
2 from Sales.salesorderheader as SOH LEFT OUTER JOIN Sales.Salesperson as SP ON(SOH.salespersonid = SP.businessentityid)
3

```

Data Output Explain Messages Notifications

	salesorderid	salespersonid	salesytd
	integer	integer	numeric
1	43659	279	2315185.611
2	43660	279	2315185.611
3	43661	282	2604540.7172
4	43662	282	2604540.7172
5	43663	276	4251368.5497
6	43664	280	1352577.1325
7	43665	283	1573012.9383
8	43666	276	4251368.5497
9	43667	277	3189418.3662
10	43668	282	2604540.7172
11	43669	283	1573012.9383
12	43670	275	3763176.1787
13	43671	283	1573012.9383

✓ Successfully run. Total query runtime: 189 msec. 31465 rows affected.

.6

pgAdmin File Object Tools Help

Browser

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 - productmodel
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 - productphoto
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 - productreview
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 - scrapreason
 - transactionhistory
 - transactionhistoryarchive
 - unitmeasure
 - workorder

Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```

1 select SalesOrderID ,P.firstname , P.lastname , SOH.SalesPersonID , SalesYTD
2 from Sales.salesorderheader as SOH
3 LEFT OUTER JOIN Sales.Salesperson as SP ON(SOH.salespersonid = SP.businessentityid)
4 FULL JOIN Sales.store ON(SP.businessentityid = Sales.store.salespersonid)
5 FULL JOIN Person.businessentity as B ON(B.businessentityid = Sales.store.businessentityid)
6 FULL JOIN Person.person as P ON(P.businessentityid = B.businessentityid)

```

Data Output Explain Messages Notifications

	salesorderid	firstname	lastname	salespersonid	salesytd
	integer	character varying (50)	character varying (50)	integer	numeric
1	43659	[null]	[null]	279	2315185.611
2	43660	[null]	[null]	279	2315185.611
3	43661	[null]	[null]	282	2604540.7172
4	43662	[null]	[null]	282	2604540.7172
5	43663	[null]	[null]	276	4251368.5497
6	43664	[null]	[null]	280	1352577.1325
7	43665	[null]	[null]	283	1573012.9383
8	43666	[null]	[null]	276	4251368.5497
9	43667	[null]	[null]	277	3189418.3662
10	43668	[null]	[null]	282	2604540.7172
11	43669	[null]	[null]	283	1573012.9383

7.

The screenshot shows the pgAdmin 4 interface with the Query Editor open. The query is as follows:

```

1 select Sales.CurrencyRate.CurrencyRateID , AverageRate ,SalesOrderID , ShipBase
2 from Sales.salesorderheader as SOH
3 LEFT OUTER JOIN Purchasing.shipmethod ON(SOH.shipmethodid = Purchasing.shipmethod.shipmethodid)
4 LEFT OUTER JOIN Sales.CurrencyRate ON(SOH.currencyrateid = Sales.CurrencyRate.currencyrateid)

```

The Data Output tab shows the following results:

currencyrateid	average rate	salesorderid	shipbase	
1	[null]	43659	8.99	
2	[null]	43660	8.99	
3	4	1.4641	43661	8.99
4	4	1.4641	43662	8.99
5	[null]	[null]	43663	8.99
6	[null]	[null]	43664	8.99
7	[null]	[null]	43665	8.99
8	[null]	[null]	43666	8.99
9	[null]	[null]	43667	8.99
10	4	1.4641	43668	8.99
11	[null]	[null]	43669	8.99
12	[null]	[null]	43670	8.99

8.

The screenshot shows the pgAdmin 4 interface with the Query Editor open. The query is as follows:

```

1 select Sales.salesperson.BusinessEntityID , P.productid
2 from Sales.salesperson
3 LEFT OUTER JOIN Sales.salesorderheader as SOH ON(Sales.salesperson.BusinessEntityID = SOH.salespersonid )
4 JOIN Sales.salesorderdetail as SOD ON(SOH.salesorderid = SOD.salesorderid )
5 JOIN Sales.specialofferproduct as SOP ON (SOD.specialofferid = SOP.specialofferid and SOD.ProductID = SOP.ProductID )
6 JOIN Production.product as P ON (P.productid = SOP.productid )

```

The Data Output tab shows the following results:

businessentityid	productid	
1	282	896
2	278	841
3	279	835
4	282	988
5	284	913
6	282	968
7	277	751
8	281	949
9	278	726
10	287	783
11	275	917

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 - unitmeasure
 - workorder

Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```

1 select Per.firstname , per.lastname , P.name
2 from Sales.salesorderheader as SOH
3 JOIN Sales.salesorderdetail as SOD ON(SOH.salesorderid = SOD.salesorderid)
4 JOIN Production.product as P ON(SOD.productid = P.productid)
5 JOIN Sales.customer as C ON(C.customerid = SOH.customerid)
6 LEFT OUTER JOIN Person.person as Per ON(Per.businessentityid = C.PersonID)

```

Data Output Explain Messages Notifications

	firstname character varying (50)	lastname character varying (50)	name character varying (50)
1	[null]	[null]	Mountain-100 Black, 42
2	[null]	[null]	Mountain-100 Black, 44
3	[null]	[null]	Mountain-100 Black, 48
4	[null]	[null]	Mountain-100 Silver, 38
5	[null]	[null]	Mountain-100 Silver, 42
6	[null]	[null]	Mountain-100 Silver, 44
7	[null]	[null]	Mountain-100 Silver, 48
8	[null]	[null]	Long-Sleeve Logo Jersey, M
9	[null]	[null]	Long-Sleeve Logo Jersey, XL
10	[null]	[null]	Mountain Bike Socks, M
11	[null]	[null]	AWC 1 can Can

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pgAdmin File Object Tools Help

Browser

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 - productinventory
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 - scrapreason
 - transactionhistory
 - transactionhistoryarchive
 - unitmeasure
 - workorder

Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```

1 SELECT schemaname, relname, n_live_tup
2 FROM pg_stat_user_tables
3 ORDER BY n_live_tup DESC;

```

Data Output Explain Messages Notifications

	schemaname name	relname name	n_live_tup bigint
1	sales	salesorderd...	121317
2	production	transactionh...	113443
3	production	transactionh...	89253
4	production	workorder	72591
5	production	workorderro...	67131
6	sales	salesorderh...	31465
7	sales	salesorderh...	27647
8	sales	customer	19820
9	person	address	19614
10	sales	personcredi...	19118
11	sales	creditcard	19118
12	sales	currencyrate	13532
13	purchasing	purchaseord...	8845

✓ Successfully run. Total query runtime: 150 msec. 70 rows affected.

.11

pgAdmin File Object Tools Help

Browser

- Procedures
- Sequences
- Tables (19)
 - countryregioncurrency
 - creditcard
 - currency
 - currencyrate
 - customer
 - personcreditcard
 - salesorderdetail
 - salesorderheader
 - Columns
 - Constraints
 - Indexes
 - RLS Policies
 - Rules
 - Triggers
 - salesorderheadersalesreason
 - salesperson
 - salespersonquotahistory
 - salesreason
 - salestaxrate
 - salesterritory
 - salesterritoryhistory
 - shoppingcartitem

Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```

1
2 SELECT
3     indexname,
4     indexdef
5 FROM
6     pg_indexes
7 WHERE
8     tablename = 'salesorderheader';

```

Data Output Explain Messages Notifications

	indexname name	indexdef text
1	PK_SalesOrderHeader_SalesOrderID	CREATE UNIQUE INDEX 'PK_SalesOrderHeader_SalesOrderID' ON sales.salesorderheader USING btree (sal...

.12

pgAdmin File Object Tools Help

Browser

- Servers (1)
 - PostgreSQL 12
 - Databases (6)
 - adventureworks
 - Casts
 - Catalogs
 - Event Triggers
 - Extensions
 - Foreign Data Wrappers
 - Languages
 - Schemas (11)
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 - humanresources
 - pe
 - person
 - pr
 - production
 - Collations
 - Domains
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Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```

1 select *
2 from sales.salesorderheader
3 where territoryid = 4

```

Data Output Explain Messages Notifications

	salesorderid [PK] integer	revisionnumber smallint	orderdate timestamp without time zone	duedate timestamp without time zone	shipdate timestamp without time zone	status smallint	on bo
1	43663	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
2	43666	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
3	43678	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
4	43680	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
5	43689	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
6	43691	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
7	43692	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
8	43700	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
9	43702	8	2011-06-01 00:00:00	2011-06-13 00:00:00	2011-06-08 00:00:00	5	1
10	43706	8	2011-06-02 00:00:00	2011-06-14 00:00:00	2011-06-09 00:00:00	5	1
11	43707	8	2011-06-02 00:00:00	2011-06-14 00:00:00	2011-06-09 00:00:00	5	1
12	43713	8	2011-06-04 00:00:00	2011-06-14 00:00:00	2011-06-09 00:00:00	5	1
13	43719	8	2011-06-05 00:00:00	2011-06-14 00:00:00	2011-06-09 00:00:00	5	1

Successfully run. Total query runtime: 320 msec. 6224 rows affected.

pgAdmin File Object Tools Help

Browser Servers (1) PostgreSQL 12 Databases (6) adventureworks

Query Editor Query History

```

1 EXPLAIN
2 select *
3 from sales.salesorderheader
4 where territoryid = 4
5
6

```

Data Output Explain Messages Notifications

QUERY PLAN text

1	Seq Scan on salesorderheader (cost=0.00..1115.31 rows=6240 width=431)
2	Filter: (territoryid = 4)

.13

pgAdmin File Object Tools Help

Browser Servers (1) PostgreSQL 12 Databases (6) adventureworks

Query Editor Query History

```

1 select *
2 from sales.salesorderheader
3 where territoryid < 4

```

Data Output Explain Messages Notifications

	salesorderid [PK] integer	revisionnumber smallint	orderdate timestamp without time zone	duedate timestamp without time zone	shipdate timestamp without time zone	status smallint	on bo
1	43664	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
2	43665	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
3	43667	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
4	43669	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
5	43670	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
6	43671	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
7	43673	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
8	43675	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
9	43682	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
10	43683	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
11	43686	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
12	43687	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
13	43688	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5

Successfully run. Total query runtime: 363 msec. 5331 rows affected.

pgAdmin File Object Tools Help

Browser Servers (1) PostgreSQL 12 Databases (6) adventureworks

Query Editor Query History

```

1 EXPLAIN
2 select *
3 from sales.salesorderheader
4 where territoryid < 4
5
6

```

Data Output Explain Messages Notifications

QUERY PLAN text

1	Seq Scan on salesorderheader (cost=0.00..1115.31 rows=5291 width=431)
2	Filter: (territoryid < 4)

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pgAdmin

File Object Tools Help

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adventureworks/postgres@PostgreSQL 12

Query Editor Query History

```
1 select *
2 from sales.salesorderheader
3 where territoryid > 4
```

Data Output Explain Messages Notifications

salesorderid	revisionnumber	orderdate	duedate	shipdate	status
[PK] integer	smallint	timestamp without time zone	timestamp without time zone	timestamp without time zone	smallint
1	43659	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
2	43660	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
3	43661	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
4	43662	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
5	43668	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
6	43672	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
7	43674	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
8	43676	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
9	43677	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
10	43679	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
11	43681	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
12	43684	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
13	43685	8 2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5

Successfully run. Total query runtime: 450 msec. 19910 rows affected.

pgAdmin

File Object Tools Help

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adventureworks/postgres@PostgreSQL 12

Query Editor Query History

```
1 EXPLAIN
2 select *
3 from sales.salesorderheader
4 where territoryid > 4
5
6
```

Data Output Explain Messages Notifications

QUERY PLAN

text

1	Seq Scan on salesorderheader (cost=0.00..1115.31 rows=19934 width=431)
2	Filter: (territoryid > 4)

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pgAdmin File Object Tools Help

Browser

- Procedures
- Sequences
- Tables (19)
 - countryregioncurrency
 - creditcard
 - currency
 - currencyrate
 - customer
 - personcreditcard
 - salesorderdetail
 - salesorderheader
 - Columns
 - Constraints
 - Indexes
 - RLS Policies
 - Rules
 - Triggers
 - salesorderheadersalesreason
 - salesperson
 - salespersonquotahistory
 - salesreason
 - salestaxrate
 - salesterritory
 - salesterritoryhistory
 - shoppingcartitem

Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```
1 CREATE INDEX index_territoryid ON sales.salesorderheader
2 (
3     territoryid
4 );
```

Data Output Explain Messages Notifications

CREATE INDEX

Query returned successfully in 185 msec.

pgAdmin File Object Tools Help

Browser

- Materialized Views
- Procedures
- Sequences
- Tables (19)
 - countryregioncurrency
 - creditcard
 - currency
 - currencyrate
 - customer
 - personcreditcard
 - salesorderdetail
 - salesorderheader
 - Columns
 - Constraints
 - Indexes (1)
 - index_territoryid
 - RLS Policies
 - Rules
 - Triggers
 - salesorderheadersalesreason
 - salesperson
 - salespersonquotahistory
 - salesreason
 - salestaxrate
 - salesterritory
 - salesterritoryhistory
 - shoppingcartitem

Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```
1
2 SELECT
3     indexname,
4     indexdef
5 FROM
6     pg_indexes
7 WHERE
8     tablename = 'salesorderheader';
9
```

Data Output Explain Messages Notifications

indexname	indexdef
PK_SalesOrderHeader_SalesOrderID	CREATE UNIQUE INDEX "PK_SalesOrderHeader_SalesOrderID" ON sales.salesorderheader USING btree (salesorderid)
index_territoryid	CREATE INDEX index_territoryid ON sales.salesorderheader USING btree (territoryid)

Successfully run. Total query runtime: 147 msec. 2 rows affected.

pgAdmin File Object Tools Help

Browser

- Materialized Views
- Procedures
- Sequences
- Tables (19)
 - countryregioncurrency
 - creditcard
 - currency
 - currencyrate
 - customer
 - personcreditcard
 - salesorderdetail
 - salesorderheader
 - Columns
 - Constraints
 - Indexes (1)
 - index_territoryid
 - RLS Policies
 - Rules
 - Triggers
 - salesorderheadersalesreason
 - salesperson
 - salespersonquotahistory
 - salesreason
 - salestaxrate
 - salesterritory
 - salesterritoryhistory
 - shoppingcartitem

Dashboard Properties SQL Statistics Dependencies Dependents adventurework... adventureworks/postgres@PostgreSQL 12 *

Query Editor Query History

```
1 select *
2 from sales.salesorderheader
3 where territoryid = 4
4
```

Data Output Explain Messages Notifications

salesorderid	revisionnumber	orderdate	duedate	shipdate	status
[PK] integer	smallint	timestamp without time zone	timestamp without time zone	timestamp without time zone	smallint
43663		2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
43666		2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
43678		2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
43680		2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
43689		2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
43691		2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
43692		2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
43700		2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5
43702		2011-06-01 00:00:00	2011-06-13 00:00:00	2011-06-08 00:00:00	5
43706		2011-06-02 00:00:00	2011-06-14 00:00:00	2011-06-09 00:00:00	5
43707		2011-06-02 00:00:00	2011-06-14 00:00:00	2011-06-09 00:00:00	5
43713		2011-06-04 00:00:00	2011-06-16 00:00:00	2011-06-11 00:00:00	5

Successfully run. Total query runtime: 446 msec. 6224 rows affected.

pgAdmin

File Object Tools Help

Browser

- Servers (1)
 - PostgreSQL 12
 - Databases (6)
 - adventureworks
 - Casts
 - Catalogs
 - Event Triggers
 - Extensions
 - Foreign Data Wrappers
 - Languages
 - Schemas (11)
 - hr
 - humanresources
 - pe
 - person
 - pr
 - production
 - Collations
 - Domains
 - FTS Configurations
 - FTS Dictionaries
 - FTS Parsers
 - FTS Templates
 - Foreign Tables
 - Functions

Dashboard Properties SQL Statistics Dependencies Dependencies adventureworks/postgres@PostgreSQL 12 * adventurework...

adventureworks/postgres@PostgreSQL 12

Query Editor Query History

```

1 EXPLAIN
2 select *
3 from sales.salesorderheader
4 where territoryid = 4

```

Data Output Explain Messages Notifications

QUERY PLAN

text

1	Bitmap Heap Scan on salesorderheader (cost=120.65..920.65 rows=6240 width=431)
2	Recheck Cond: (territoryid = 4)
3	Bitmap Index Scan on index_territoryid (cost=0.00..119.09 rows=6240 width=0)
4	Index Cond: (territoryid = 4)

Successfully run. Total query runtime: 107 msec. 4 rows affected.

.16

pgAdmin

File Object Tools Help

Browser

- Materialized Views
- Procedures
- Sequences
- Tables (19)
 - countryregioncurrency
 - creditcard
 - currency
 - currencyrate
 - customer
 - personcreditcard
 - salesorderdetail
 - salesorderheader
 - Columns
 - Constraints
 - Indexes (1)
 - index_territoryid
 - RLS Policies
 - Rules
 - Triggers
 - salesorderheadersalesreason
 - salesperson
 - salespersonquotahistory
 - salesreason
 - salestaxrate
 - salesperson

Dashboard Properties SQL Statistics Dependencies Dependencies adventurework... adventureworks/postgres@PostgreSQL 12 *

adventureworks/postgres@PostgreSQL 12

Query Editor Query History

```

1 select *
2 from sales.salesorderheader
3 where territoryid < 4
4

```

Data Output Explain Messages Notifications

	salesorderid [PK] integer	revisionnumber smallint	orderdate timestamp without time zone	duedate timestamp without time zone	shipdate timestamp without time zone	status smallint	on bo
1	43664	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
2	43665	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
3	43667	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
4	43669	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
5	43670	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
6	43671	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
7	43673	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
8	43675	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
9	43682	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
10	43683	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
11	43686	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1
12	43687	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00	5	1

Successfully run. Total query runtime: 304 msec. 5331 rows affected.

pgAdmin

File Object Tools Help

Browser

- Servers (1)
 - PostgreSQL 12
 - Databases (6)
 - adventureworks
 - Casts
 - Catalogs
 - Event Triggers
 - Extensions
 - Foreign Data Wrappers
 - Languages
 - Schemas (11)
 - hr
 - humanresources
 - pe
 - person
 - pr
 - production
 - Collations
 - Domains
 - FTS Configurations
 - FTS Dictionaries
 - FTS Parsers
 - FTS Templates
 - Foreign Tables
 - Functions

Dashboard Properties SQL Statistics Dependencies Dependencies adventureworks/postgres@PostgreSQL 12 * adventurework...

adventureworks/postgres@PostgreSQL 12

Query Editor Query History

```

1 EXPLAIN
2 select *
3 from sales.salesorderheader
4 where territoryid < 4

```

Data Output Explain Messages Notifications

QUERY PLAN

text

1	Bitmap Heap Scan on salesorderheader (cost=101.29..889.43 rows=5291 width=431)
2	Recheck Cond: (territoryid < 4)
3	Bitmap Index Scan on index_territoryid (cost=0.00..99.97 rows=5291 width=0)
4	Index Cond: (territoryid < 4)

Successfully run. Total query runtime: 114 msec. 4 rows affected.

pgAdmin File Object Tools Help

Browser: Materialized Views, Procedures, Sequences, Tables (19): countryregioncurrency, creditcard, currency, currencyrate, customer, personcreditcard, salesorderheader, Columns, Constraints, Indexes (1): index_territoryid, RLS Policies, Rules, Triggers, salesorderheadersalesreason, salesperson, salespersonquotahistory, salesreason, saletaxrate

Dashboard Properties SQL Statistics Dependencies Dependents **adventurework...** **adventureworks/postgres@PostgreSQL 12 ***

Query Editor Query History

```

1 select *
2 from sales.salesorderheader
3 where territoryid > 4
4

```

Data Output Explain Messages Notifications

	salesorderid [PK] integer	revisionnumber smallint	orderdate timestamp without time zone	duedate timestamp without time zone	shipdate timestamp without time zone	status smallint	
1	43659	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
2	43660	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
3	43661	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
4	43662	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
5	43668	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
6	43672	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
7	43674	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
8	43676	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
9	43677	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
10	43679	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
11	43681	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5
12	43684	8	2011-05-31 00:00:00	2011-06-12 00:00:00	2011-06-07 00:00:00		5

Successfully run. Total query runtime: 438 msec. 19910 rows affected.

pgAdmin File Object Tools Help

Browser: Servers (1): PostgreSQL 12: Databases (6): adventureworks: Casts, Catalogs, Event Triggers, Extensions, Foreign Data Wrappers, Languages, Schemas (11): hr, humanresources, pe, person, pr, production: Collations, Domains, FTS Configurations, FTS Dictionaries, FTS Parsers, FTS Templates, Foreign Tables, Functions

Dashboard Properties SQL Statistics Dependencies Dependents **adventureworks/postgres@PostgreSQL 12 *** **adventurework...**

Query Editor Query History

```

1 EXPLAIN
2 select *
3 from sales.salesorderheader
4 where territoryid > 4

```

Data Output Explain Messages Notifications

QUERY PLAN

text

1 Seq Scan on salesorderheader (cost=0.00..1115.31 rows=19934 width=431)

2 Filter: (territoryid > 4)

Successfully run. Total query runtime: 106 msec. 2 rows affected.