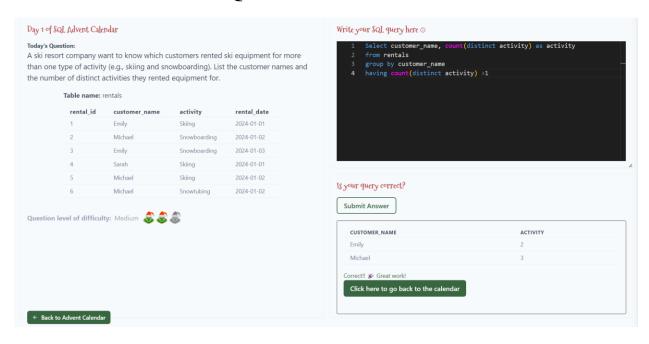
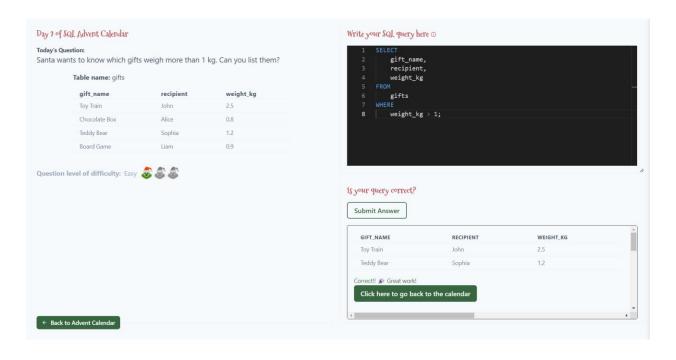
SQL Advent Calendar





Day 3 of SQL Advent Calendar

Today's Question:

You're trying to identify the most calorie-packed candies to avoid during your holiday binge. Write a query to rank candies based on their calorie count within each category. Include the candy_name, candy_category, calories, and rank (rank_in_category) within the category.

Table name: candy_nutrition

candy_id	candy_name	calories	candy_category
1	Candy Cane	200	Sweets
2	Chocolate Bar	250	Chocolate
3	Gingerbread Cookie	150	Baked Goods
4	Lollipop	100	Sweets
5	Dark Chocolate Truffle	180	Chocolate
6	Marshmallow	900	Sweets
7	Sugar Cookie	140	Baked Goods

Question level of difficulty: Hard 👶 👶 🕏





Write your SQL query here O

- select candy_name,candy_category,
 calories,rank() over (partition by candy_category order by calories des
 from candy_nutrition
 order by candy_category,candy_name
- Is your query correct?

Submit Answer

CANDY_NAME	CANDY_CATEGORY	CALORIES	RANK	Î
Gingerbread Cookie	Baked Goods	150	1	
Sugar Cookie	Baked Goods	140	2	
Chocolate Bar	Chocolate	250	1	
Dark Chocolate Truffle	Chocolate	180	2	
Candy Cane	Sweets	200	2	
Lollinon	Sweets	100	3	-

← Back to Advent Calendar

Day 4 of SQL Advent Calendar

Today's Question:

You're planning your next ski vacation and want to find the best regions with heavy snowfall. Given the tables resorts and snowfall, find the average snowfall for each region and sort the regions in descending order of average snowfall. Return the columns region and average_snowfall.

Table name: ski_resorts

resort_id	resort_name	region
1	Snowy Peaks	Rocky Mountains
2	Winter Wonderland	Wasatch Range
3	Frozen Slopes	Alaska Range
4	Powder Paradise	Rocky Mountains

Table name: snowfall

resort_id	snowfall_inches
1	60
2	45
3	75
4	55

Question level of difficulty: Medium

← Back to Advent Calendar



Write your SQL query here o

- select r.region,
 avg(s.snowfall_inches) as average_snowfall
 from ski_resorts r join snowfall s on r.resort_id = s.resort_id group by r.region order by average_snowfall desc
- Is your query correct?

Submit Answer

REGION	AVERAGE_SNOWFALL	
Alaska Range	75	
Rocky Mountains	57.5	
Wasatch Range	45	



Write your SQL query here \odot

```
1 select beach_name,
2 country,
3 expected_temperature_c,
4 date
5 from beach_temperature_predictions
6 where expected_temperature_c >30 and date = "2024-12-25"
7
```

Is your query correct?

Submit Answer

EACH_NAME	COUNTRY	EXPECTED_TEMPERATURE_C	DATE
ifton Beach	South Africa	31	2024-12-25

Question level of difficulty: Easy 💰 🕏 🕏

← Back to Advent Calendar

Day 6 of SQL Advent Calendar

Today's Question:

Scientists are tracking polar bears across the Arctic to monitor their migration patterns and caloric intake. Write a query to find the top 3 polar bears that have traveled the longest total distance in December 2024. Include their bear_id, bear_name, and total_distance_traveled in the results.

Table name: polar_bears

bear_id	bear_name	age
1	Snowball	10
2	Frosty	7
3	Iceberg	15
4	Chilly	5

Table name: tracking

	Table name: track	king		
	tracking_id	bear_id	distance_km	date
	1	1	25	2024-12-01
	2	2	40	2024-12-02
	3	1	30	2024-12-03
	4	3	50	2024-12-04
	5	2	35	2024-12-05
	6	4	20	2024-12-06
	7	3	55	2024-12-07
← Back to	o Advent Calendar			

Write your SQL query here \odot

```
1 select b.bear_id,
2 b.bear_name,
3 sum(t.distance_km) as total_distance_travelled
4 from polar_bears b
5 join tracking t on t.bear_id = b.bear_id
6 where t.date between '2024-12-01' and '2024-12-31'
7 group by b.bear_id,b.bear_name
8 order by total_distance_travelled desc
9 limit 3
10
```

Is your query correct?

Submit Answer

BEAR_ID	BEAR_NAME	TOTAL_DISTANCE_TRAVELLED	
3	Iceberg	105	
1	Snowball	100	
2	Frosty	75	

Day 7 of SQL Advent Calendar

Today's Question:

The owner of a winter market wants to know which vendors have generated the highest revenue overall. For each vendor, calculate the total revenue for all their items and return a list of the top 2 vendors by total revenue. Include the vendor_name and total_revenue in your results.

Table name: vendors

vendor_id	vendor_name	market_location
1	Cozy Crafts	Downtown Square
2	Sweet Treats	Central Park
3	Winter Warmers	Downtown Square

Table name: sales

sale_id	vendor_id	item_name	quantity_sold	price_per_unit
1	1	Knitted Scarf	15	25
2	2	Hot Chocolate	50	3.5
3	3	Wool Hat	20	18
4	1	Handmade Ornament	10	15
5	2	Gingerbread Cookie	30	5

← Back to Advent Calendar

Write your SQL query here ① select v.vendor_name, sum(s.quantity_sold * s.price_per_unit) as total_revenue from vendors v join sales s on v.vendor_id = s.vendor_id group by v.vendor_name order by total_revenue desc limit 2

Is your query correct?

Submit Answer

VENDOR_NAME TOTAL_REVENUE Cozy Crafts 525 Winter Warmers 360	525			
,		/ENDOR_NAME	TOTAL_REVENUE	
Winter Warmers 360	360	Cozy Crafts	525	
		Winter Warmers	360	
rect!! 🞉 Great work!		rect!! 🞉 Great work!		
rrect!! 🎉 Great work!	ar I		lendar	
	or .		lendar	
rrect!! 🌠 Great work! Click here to go back to the calendar	ar .		lendar	

Day 8 of SQL Advent Calendar

Today's Question:

You are managing inventory in Santa's workshop. Which gifts are meant for "good" recipients? List the gift name and its weight.

Table name: gifts

gift_id	gift_name	recipient_type	weight_kg
1	Toy Train	good	2.5
2	Lumps of Coal	naughty	1.5
3	Teddy Bear	good	1.2
4	Chocolate Bar	good	0.3
5	Board Game	naughty	1.8

Question level of difficulty: Easy 🕏 🕏 🕏



Write your SQL query here \odot

```
select gift_name,
weight_kg
from gifts
where recipient_type = 'good'
```

Is your query correct?

Submit Answer

2.5	
1.2	
0.3	
	1.2 0.3

Day 9 of SQL Advent Calendar Today's Question: A community is hosting a series of festive feasts, and they want to ensure a balanced menu. Write a query to identify the top 3 most calorie-dense dishes (calories per gram) served for each event. Include the dish name, event name, and the calculated calorie density in your results. Table name: events event id event name Christmas Eve Dinner New Years Feast Winter Solstice Potluck Table name: menu dish id dish name event_id calories weight g Roast Turkey 3500 5000 Chocolate Yule Log 1 2200 1000 Cheese Fondue 1500 800 Holiday Fruitcake 4000 1200

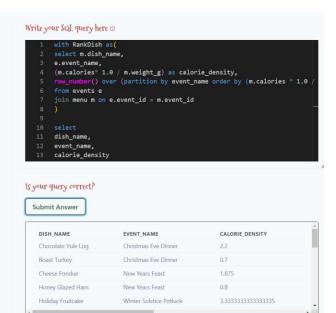
Honey Glazed Ham 2

Question level of difficulty: Hard 💰 🕏 🕏

← Back to Advent Calendar

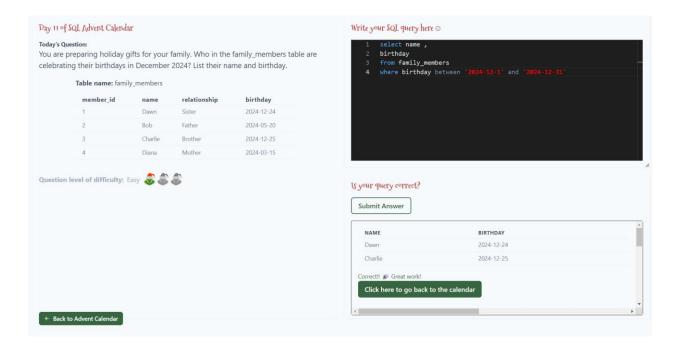
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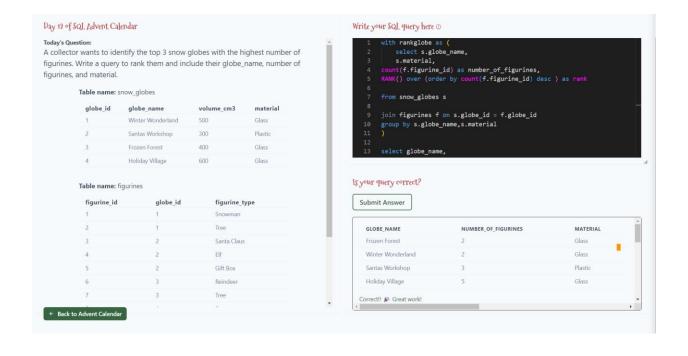
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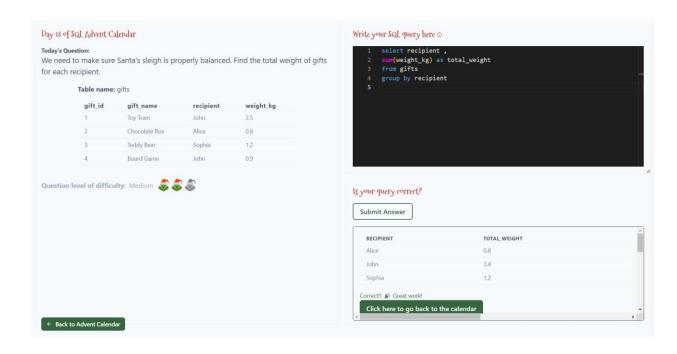


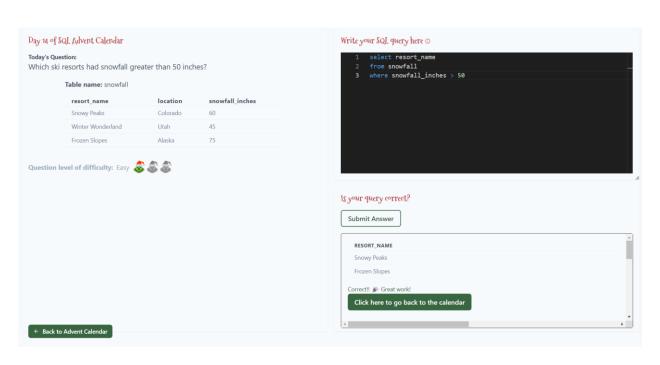
Day 10 of SQL Advent Calendar Today's Question: You are tracking your friends' New Year's resolution progress. Write a query to calculate the following for each friend: number of resolutions they made, number of resolutions they completed, and success percentage (% of resolutions completed) and a success category based on the success percentage: - Green: If success percentage is greater than 75%. - Yellow: If success percentage is between 50% and 75% (inclusive). - Red: If success percentage is less than 50%. Table name: resolutions resolution id friend name resolution is completed Alice Exercise daily Alice Read 20 books Bob Save money Eat healthier Bob Charlie Travel more Charlie Learn a new skill Diana Volunteer monthly 1 Diana Drink more water Diana Sleep 8 hours Question level of difficulty: Medium 👶 🕏 🗟 ← Back to Advent Calendar

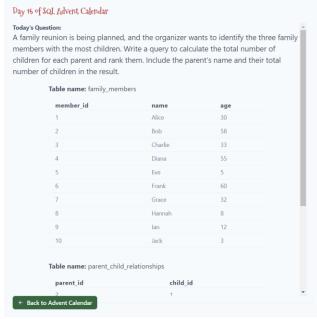




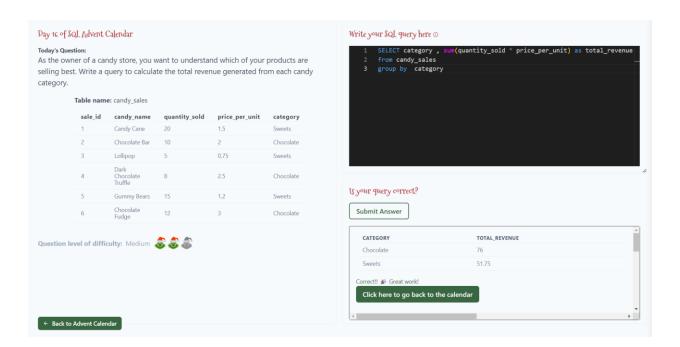












Day 17 of SQL Advent Calendar

Today's Question:

The Grinch is planning out his pranks for this holiday season. Which pranks have a difficulty level of "Advanced" or "Expert"? List the prank name and location (both in descending order).

Table name: grinch_pranks

prank_id	prank_name	location	difficulty
1	Stealing Stockings	Whoville	Beginner
2	Christmas Tree Topple	Whoville Town Square	Advanced
3	Present Swap	Cindy Lous House	Beginner
4	Sleigh Sabotage	Mount Crumpit	Expert
5	Chimney Block	Mayors Mansion	Expert

Question level of difficulty: Easy



Write your SQL query here ①

SELECT prank_name, location from grinch_pranks
where difficulty in ('Advanced' , 'Expert'
order by prank_name desc , location desc

Is your query correct?

Submit Answer

Sleigh Sabotage	Mount Crumpit	
Christmas Tree Topple	Whoville Town Square	
Chimney Block	Mayors Mansion	
orrect!! 🞉 Great work!		

← Back to Advent Calendar

Day 18 of SQL Advent Calendar

Today's Question:

A travel agency is promoting activities for a "Summer Christmas" party. They want to identify the top 2 activities based on the average rating. Write a query to rank the activities by average rating.

Table name: activities

activity_id	activity_name	
1	Surfing Lessons	
2	Jet Skiing	
3	Sunset Yoga	

Table name: activity_ratings

rating_id	activity_id	rating
1.	1	4.7
2	1	4.8
3	1	4.9
4	2	4.6
5	2	4.7
6	2	4.8
7	2	4.9
8	3	4.8
	-	

Write your SQL query here ©

```
with rankedActivites as(
select a.activity_name,
avg(ar.rating) as average_rating,
ROM_NUMBER() over (order by avg(ar.rating) desc) as ranks
from activities a
join activity_ratings ar on a.activity_id = ar.activity_id
group by
a.activity_name
select activity_name,
average_rating,
ranks
from rankedActivites
```

Is your query correct?

Submit Answer

ACTIVITY_NAME	AVERAGE_RATING	RANKS
Sunset Yoga	4.82	1
Surfing Lessons	4.8	2
orrect!! 🞉 Great work! Click here to go back to	the calendar	

Day 19 of SQL Advent Calendar

Today's Question:

Scientists are studying the diets of polar bears. Write a query to find the maximum amount of food (in kilograms) consumed by each polar bear in a single meal December 2024. Include the bear_name and biggest_meal_kg, and sort the results in descending order of largest meal consumed.

Table name: polar_bears

bear_id	bear_name	age
1	Snowball	10
2	Frosty	7
3	Iceberg	15

Table name: meal_log

log_id	bear_id	food_type	food_weight_kg	date
1	1	Seal	30	2024-12-01
2	2	Fish	15	2024-12-02
3	1	Fish	10	2024-12-03
4	3	Seal	25	2024-12-04
5	2	Seal	20	2024-12-05
6	3	Fish	18	2024-12-06

Curestion level of difficulty: Marlium 🚓 🌨 🌊



Write your SQL query here o

```
SELECT pb.bear_name,
max(m.food_weight_kg)as biggest_meal_kg
from polar_bears pb
join meal_log m on pb.bear_id = m.bear_id
where m.date between '2024-12-1' and '2024-
group by bear_name
order by biggest_meal_kg desc
```

Is your query correct?

Submit Answer

Correct!! 🗩 Great work!

Click here to go back to the calendar

Day 20 of SQL Advent Calendar

We are looking for cheap gifts at the market. Which vendors are selling items priced below \$10? List the unique (i.e. remove duplicates) vendor names.

Table name: vendors

vendor_id	vendor_name	market_location
1	Cozy Crafts	Downtown Square
2	Sweet Treats	Central Park
3	Winter Warmers	Downtown Square

Table name: item_prices

item_id	vendor_id	item_name	price_usd
1	1	Knitted Scarf	25
2	2	Hot Chocolate	5
3	2	Gingerbread Cookie	3.5
4	3	Wool Hat	18
5	3	Santa Pin	2

Question level of difficulty: Easy 💰 🗟 🍣



Write your SQL query here o

```
SELECT DISTINCT(v.vendor_name) as vendor_name
from vendors v
join item_prices ip on v.vendor_id = ip.vendor_id
where ip.price_usd < 10
```

Is your query correct?

Submit Answer

VENDOR_NAME Sweet Treats Winter Warmers Click here to go back to the calendar

Day 21 of SQL Advent Calendar

Today's Question:

Santa needs to optimize his sleigh for Christmas deliveries. Write a query to calculate the total weight of gifts for each recipient type (good or naughty) and determine what percentage of the total weight is allocated to each type. Include the recipient_type, total_weight, and weight_percentage in the result.

Table name: gifts

gift_id	gift_name	recipient_type	weight_kg
1	Toy Train	good	2.5
2	Lumps of Coal	naughty	1.5
3	Teddy Bear	good	1.2
4	Chocolate Bar	good	0.3
5	Board Game	naughty	1.8

Question level of difficulty: Hard 👶 🕏 🕏



← Back to Advent Calendar

Write your SQL query here ①

```
SELECT recipient_type,
sum(weight_kg) as total_weight,
(sum(weight_kg)*100.0)/(SELECT sum(weight_kg) from gifts) as weight_per
group by recipient_type
order by weight_percentage desc
```

Is your query correct?

Submit Answer

good 4 54.794520547945204 naughty 3.3 45.205479452054796
naughty 3.3 45.205479452054796
Correct!! 🞉 Great work!

Day 22 of SQL Advent Calendar

Today's Question:

We are hosting a gift party and need to ensure every guest receives a gift. Using the guests and guest_gifts tables, write a query to identify the guest(s) who have not been assigned a gift (i.e. they are not listed in the guest_gifts table).

Table name: guests

guest_id	guest_name	
1	Cindy Lou	
2	The Grinch	
3	Max the Dog	
4	Marine Mari Milan	

Table name: guest_gifts

gift_id	guest_id	gift_name	
1	1	Toy Train	
2	1	Plush Bear	
3	2	Bag of Coal	
4	2	Sleigh Bell	
5	3	Dog Treats	

Question level of difficulty: Medium 💰 🕏 💰

← Back to Advent Calendar



Write your SQL query here o

```
g.guest_name
FROM
guests g
   guest_gifts gg ON g.guest_id = gg.guest_id
    gg.guest_id IS NULL;
```

Is your query correct?

Submit Answer



Day 23 of SQL Advent Calendar

Today's Question:

The Grinch tracked his weight every day in December to analyze how it changed daily. Write a query to return the weight change (in pounds) for each day, calculated as the difference from the previous day's weight.

Table name: grinch_weight_log

log_id	day_of_month	weight
1	1	250
2	2	248
3	3	249
4	4	247
5	5	246
6	6	248

Question level of difficulty: Medium 👶 👶 🗟



Write your SQL query here o

- SELECT day_of_month, weight, weight over (order by day_of_month) as weight_change from grinch_weight_log order by day_of_month

Is your query correct?

Submit Answer

DAY_OF_MONTH	WEIGHT	WEIGHT_CHANGE	
1	250		
2	248	-2	
3	249	1	
4	247	-2	
5	246	-1	
6	248	2	

← Back to Advent Calendar

Day 24 of SQL Advent Calendar

Santa is tracking how many presents he delivers each night leading up to Christmas. He wants a running total to see how many gifts have been delivered so far on any given night. Using the deliveries table, calculate the cumulative sum of gifts delivered, ordered by the delivery date.

Table name: deliveries

delivery_date	gifts_delivered
2024-12-20	120
2024-12-21	150
2024-12-22	200
2024-12-23	300
2024-12-24	500

Question level of difficulty: Hard 🝣 🕏 🕏



Write your SQL query here o

- Setted
 delivery_date,
 gifts_delivered,
 sum(gifts_delivered) over (order by delivery_date) as cumulative_sum
 from deliveries
 order by delivery_date
- Is your query correct?

Submit Answer

DELIVERY_DATE	GIFTS_DELIVERED	CUMULATIVE_SUM	_
2024-12-20	120	120	
2024-12-21	150	270	
2024-12-22	200	470	
2024-12-23	300	770	
2024-12-24	500	1270	
			· ·