BDD Advanced : Test of Tuesday 21th March 2023 - Afternoon

We have a table containing NGO associations. The city of an NGO is where its headquarters reside. An association may launch several actions.

An action can be of type “human rights”, “consumer protection”, “environmental”, “health”, and is done in a city. An action launched by an NGO has a certain duration in days.

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| --- | --- |
| Here is our data model: | * NGO (nid: integer, aname: string, city: string) * Launch (nid: integer, aid: integer, duration: int, start\_date: datetime) * Action (aid: integer, aname: string, type: string, city: string) |

**1: Draw the Entity Diagram associated (2 points):**

**2 - SQL query: Find all NGOs in “Paris”that have launched an “environmental” action (2 points - No NATURAL JOIN allowed !!):**

Delet

INSERT INTO ACTION(1,’Action Health’,’Paris’)

Select

Select N.\* from NGO N, Launch L, Action A

WHERE N.nid = L.nid AND A.aid = L.aid

AND N.city = ‘Paris’ And

**3 - SQL: Display the average duration of actions done by each NGO and in the same query display only NGO that have launched actions with a duration of 10 days minimum (4 points):**

SELECT AVG(DURATION), N.aname

FROM NGO N JOIN LAUNCH L ON N.nid= L.nid

WHERE DURATION >10

GROUP BY N.nid, N.aname

**4 - SQL: Find NGO that have launched an environmental game and also a Health one (4points):**

SELECT \* FROM LAUNCH L JOIN Action A ON L.aid = A.aid

WHERE type = ‘environemental’

AND L.nid IN (

SELECT \* FROM LAUNCH L JOIN Action A ON L.aid = A.aid

WHERE type = ‘environemental’

)

SELECT \* FROM LAUNCH L JOIN Action A ON L.aid = A.aid

WHERE a.type = ‘environemental’

INTERSECT

a.nid IN

**5 - SQL query: Display the total number of actions launched per type of actions (4points):**

**6 - SQL query: Display NGOs that have launched all of the Actions (Division query) (4points):**