P2 : Database Design, Initial ERD : Group 5

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List of Entities

1. Person
2. Region
3. Post Office
4. Caste
5. Pension
6. Expenditure
7. Government
8. Year
9. Bank Account
10. Job Card
11. Jobs
12. Salary

Business Problem Conquered

In accordance with the Mahatma Gandhi National Rural Employment Guarantee Act 2005 (MGNREGA), we aim to design a database which would relentlessly convey information about the scheme to the government officials trying to work on data analysis. The database would showcase the seasonal job data per state and highlight the employment ratio and ascertain job opportunities available within a region. The database also advocates the reduction of paperwork and helps in easy retrieval of data for further analysis.

Relationship between Entities:

- The MGNREGA scheme is mainly based on three things: region, caste and year.
- The two main entities for our database are Government and Person. The government entity allocates fixed expenditure per year for a region.
- Jobs are distributed as per Caste to the person.
- Per Job a Job ID is created which is linked to the Bank via Bank ID to deliver salary to the person.
- Certain jobs also offer Pension which is a new entity and has Pension ID which is provided to the people per region based on the job description via Post Office.

Key Description
- A person can have only one caste but a caste can have multiple persons under it.
- One Person can have multiple bank accounts, however a bank account can only be linked to one person.
- There can be only one expenditure per government on a particular region, in a particular year, but a single government can have multiple expenditures.
- A job will generate a single job card which will relate to only one person.
- Job card will be linked to a bank account so as to deliver the salary to the person.
- After a job is completed, the pension would be delivered to the person via post offices which are placed in a particular region.

Link to ERD : tinyurl.com/yc2wnrbv

Link to GitHub Repository : https://github.com/GandhiManan/DMDD-.git