|  |  |  |  |
| --- | --- | --- | --- |
| Serial No | Noun | S/P | Attributes of Noun |
|  | Programming | P |  |
|  | Platform | P |  |
|  | System | P |  |
|  | Authentication | S |  |
|  | Registration | S |  |
|  | Sign in | S |  |
|  | Sign out | S |  |
|  | Problem set | S |  |
|  | Contest | S | 35,51-55 |
|  | User | S | 16-20 |
|  | Administrator | S | 16-20,22 |
|  | Problem Solver | S | 16-20,21 |
|  | Judge | P |  |
|  | Field | P |  |
|  | Features | P |  |
|  | Username | S |  |
|  | Email | S |  |
|  | Password | S |  |
|  | Recovery pin | S |  |
|  | Institute | S |  |
|  | Registration number | S |  |
|  | Designation | S |  |
|  | Opportunity | P |  |
|  | Message | P |  |
|  | Error | P |  |
|  | Skills | P |  |
|  | Document | P |  |
|  | Installation | P |  |
|  | Programmer | S |  |
|  | Problem | S | 31-36 |
|  | Description file | S |  |
|  | Input file | S |  |
|  | Solution file | S |  |
|  | Assessment | P |  |
|  | Duration | S |  |
|  | Time limit | S |  |
|  | Set | P |  |
|  | Choice | P |  |
|  | Arrangement | P |  |
|  | Language | S |  |
|  | Compilation | P |  |
|  | Verdict | S |  |
|  | Wrong answer | S |  |
|  | Skill | P |  |
|  | Performance | P |  |
|  | Text | P |  |
|  | Code | S |  |
|  | Submission | S | 49-51 |
|  | Submission file | S |  |
|  | Compiler | S |  |
|  | Timestamp | S |  |
|  | Starting time | S |  |
|  | Contest name | S |  |
|  | Rank | S |  |
|  | No of problems solved | S |  |
|  | Profile | S |  |
|  |  |  |  |

Potential Data Object

* User [16-20]
* Administrator [16-20],22
* Problem Solver [16-20],21
* Problem [31-36]
* Submission [49-51]
* Contest 35,[51-55]

Final Data Object

|  |  |
| --- | --- |
| No | Data Objects |
|  | Administrator: username, email, password, recovery pin, institute, designation |
|  | Problem Solver: username, email, password, recovery pin, institute, registration number |
|  | Contest: contest\_id, contest\_name, starting\_time, duration |
|  | Problem: problem\_id, problem\_name, timelimit, question\_file, input\_file, solution\_file, contest\_id |
|  | Submission: submission\_id, submission\_file, timestamp, verdict, compiler, problem\_id, contest\_id, username |
|  | Participation: username, contest\_id, no\_of\_problems\_solved, timstamp |