**SQL Homework – Employee Database: A Mystery in Two Parts**

**Findings – Part I – Data Engineering**

1. List the following details of each employee: employee number, last name, first name, sex, and salary.

Result: Data provided for the analysis were from 1980s to 1990s. 300,024 people were found to have or had worked for the company as a paid employee in that period.

1. List first name, last name, and hire date for employees who were hired in 1986.

Result: 36,150 employees were hired in 1986.

1. List the manager of each department with the following information: department number, department name, the manager's employee number, last name, first name.

Result: Total of 24 department managers were listed in the analysis.

1. List the department of each employee with the following information: employee number, last name, first name, and department name.

Result: 331,603 records found.

1. List first name, last name, and sex for employees whose first name is "Hercules" and last names begin with "B."

Result: 20 staff with the same first name, Hercules, and with the last names begin with “B”.

1. List all employees in the Sales department, including their employee number, last name, first name, and department name.

Result: 52,245 staff were in the Sales department.

1. List all employees in the Sales and Development departments, including their employee number, last name, first name, and department name.

Result: Together with the Development department, 137,952 staff were found. Thus, 85,707 staff were in the Development department.

1. In descending order, list the frequency count of employee last names, i.e., how many employees share each last name.

Result: 1,638 unique last names were found on the employee list. Baba was the most common last name in the company which appeared 226 times. Foolsday was the least common last name which appeared 1 time only.

**Findings – Part II – Data Analysis**

The most common salary was in the range of 40,000 – 50,000, which counted over 140,000 times.

As shown in the bar chart, with job title as ‘Staff’ and ‘Senior Staff’ who earned the highest average salary.

**Findings – Epilogue**

Details for employee ID 499942:

First name: April, last name: Foolsday, sex: F, birthday: Jan 10, 1963, hire date: Feb 10, 1997.