# BANK LOAN REPORT QUERY DOCUMENT

## A. BANK LOAN REPORT | SUMMARY

### KPI's:

### Total Loan Applications

SELECT COUNT(id) AS Total_Loan_Applications FROM loan;

| | Total_Loan_Applications |
|---|---|
| ▶ | 38576 |

### MTD Loan Application ( Month to Date Loan Application )

SELECT COUNT(id) AS MTD_Total_Loan_Applications FROM loan

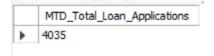WHERE MONTH(issue_date) = 12 AND YEAR(issue_date) = 2021;

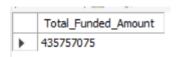| | MTD_Total_Loan_Applications |
|---|---|
| ▶ | 4314 |

### PMTD Loan Application ( Previous  Month to Date Loan Application )

SELECT COUNT(id) AS PMTD_Total_Loan_Applications FROM loan

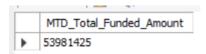WHERE MONTH(issue_date) = 11 AND YEAR(issue_date) = 2021;

| | MTD_Total_Loan_Applications |
|---|---|
| ▶ | 4035 |

### Total Funded Amount

SELECT SUM(loan_amount) AS Total_Funded_Amount FROM loan;

| | Total_Funded_Amount |
|---|---|
| ▶ | 435757075 |

### MTD Total Funded Amount

SELECT SUM(loan_amount) AS MTD_Total_Funded_Amount FROM loan

WHERE MONTH(issue_date) = 12 AND YEAR(issue_date) = 2021;

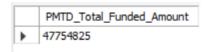| | MTD_Total_Funded_Amount |
|---|---|
| ▶ | 53981425 |

### PMTD Total Funded Amount

SELECT SUM(loan_amount) AS PMTD_Total_Funded_Amount FROM loan
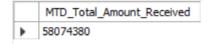
WHERE MONTH(issue_date) = 11 AND YEAR(issue_date) = 2021;

| PMTD_Total_Funded_Amount |
| --- |
| ▶ 47754825 |

### Total Amount Received

SELECT SUM(total_payment) AS Total_Amount_Received FROM loan;

| Total_Amount_Received |
| --- |
| ▶ 473070933 |

### MTD Total Amount Received

SELECT SUM(total_payment) AS MTD_Total_Amount_Received FROM loan

WHERE MONTH(issue_date) = 12 AND YEAR(issue_date) = 2021;

| MTD_Total_Amount_Received |
| --- |
| ▶ 58074380 |

### PMTD Total Amount Received

SELECT SUM(total_payment) AS PMTD_Total_Amount_Received FROM loan

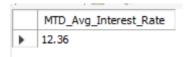WHERE MONTH(issue_date) = 12 AND YEAR(issue_date) = 2021;

| PMTD_Total_Amount_Received |
| --- |
| ▶ 50132030 |

### Average Interest Rate

SELECT ROUND(AVG(int_rate)*100,2) AS Avg_Interest_Rate FROM loan;

| Avg_Interest_Rate |
| --- |
| ▶ 12.05 |

### MTD Average Interest Rate

SELECT ROUND(AVG(int_rate)*100,2) AS MTD_Avg_Interest_Rate FROM loan

WHERE MONTH(issue_date) = 12 AND YEAR(issue_date) = 2021;

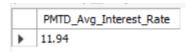| MTD_Avg_Interest_Rate |
|---|
| 12.36 |

### PMTD Average Interest Rate

SELECT ROUND(AVG(int_rate)*100,2) AS PMTD_Avg_Interest_Rate FROM loan

WHERE MONTH(issue_date) = 11 AND YEAR(issue_date) = 2021;

| PMTD_Avg_Interest_Rate |
|---|
| 11.94 |

### Avg DTI ( Average Debt to Income Percentage)

SELECT ROUND(AVG(dti)*100,2) AS Avg_DTI FROM loan;

| Avg_DTI |
|---|
| 13.33 |

### MTD Avg DTI

SELECT ROUND(AVG(dti)*100,2) AS MTD_Avg_DTI FROM loan

WHERE MONTH(issue_date) = 12 AND YEAR(issue_date) = 2021;

| MTD_Avg_DTI |
|---|
| 13.67 |

### PMTD Avg DTI

SELECT ROUND(AVG(dti)*100,2) AS PMTD_Avg_DTI FROM loan

WHERE MONTH(issue_date) = 11 AND YEAR(issue_date) = 2021;

| PMTD_Avg_DTI |
|---|
| 13.3 |

## GOOD LOAN ISSUED

### Good Loan Percentage

SELECT  (COUNT(CASE WHEN loan_status = "Fully Paid" OR loan_status =

 "Current" THEN ID END)*100) / COUNT(id) AS Good_Loan_Percentage

FROM loan;

| | Good_Loan_Percentage |
|---|---|
| ▶ | 86.1753 |

### Good loan Applications

SELECT COUNT(id) AS Good_Loan_Applications FROM loan

WHERE loan_status = "Fully Paid" OR loan_status = "Current";

| | Good_Loan_Applications |
|---|---|
| ▶ | 33243 |

### Good Loan Funded Amount

SELECT SUM(loan_amount) AS Good_Loan_Funded_Amount FROM loan

WHERE loan_status = "Fully Paid" OR loan_status = "Current";

| | Good_Loan_Funded_Amount |
|---|---|
| ▶ | 370224850 |

### Good Loan Received Amount

SELECT SUM(total_payment) AS Good_Loan_Received_Amount FROM loan

WHERE loan_status = "Fully Paid" OR loan_status = "Current";

| | Good_Loan_Received_Amount |
|---|---|
| ▶ | 435786170 |

## BAD LOAN ISSUED

Bad Loan Percentage

SELECT  (COUNT(CASE WHEN loan_status = "Charged off" THEN ID END)*100) /

COUNT(id) AS Bad_Loan_Percentage FROM loan;

| | Bad_Loan_Percentage |
|---|---|
| ▸ | 13.8247 |

Bad loan Applications

SELECT COUNT(id) AS Bad_Loan_Applications FROM loan

WHERE loan_status = "Charged off";

| | Bad_Loan_Applications |
|---|---|
| ▸ | 5333 |

Bad Loan Funded Amount

SELECT SUM(loan_amount) AS Bad_Loan_Funded_Amount FROM loan

WHERE loan_status = "Charged off";

| | Bad_Loan_Funded_Amount |
|---|---|
| ▸ | 65532225 |

Bad Loan Received Amount

SELECT SUM(total_payment) AS Bad_Loan_Received_Amount FROM loan

WHERE loan_status = "Charged off";

| | Bad_Loan_Received_Amount |
|---|---|
| ▸ | 37284763 |

## LOAN STATUS

SELECT loan_status,

COUNT(id) AS Total_Applocations_Count,

SUM(total_payment) AS Total_amount_Received,

SUM(loan_amount) AS Total_Amount_Funded,

ROUND(AVG(int_rate * 100),2) AS Average_Interest_rate,

ROUND(AVG(dti * 100),2) AS Average_DTI

FROM loan

GROUP BY loan_status;

| loan_status | Total_Applocations_Count | Total_amount_Received | Total_Amount_Funded | Average_Interest_rate | Average_DTI |
|---|---|---|---|---|---|
| Charged Off | 5333 | 37284763 | 65532225 | 13.88 | 14 |
| Fully Paid | 32145 | 411586256 | 351358350 | 11.64 | 13.17 |
| Current | 1098 | 24199914 | 18866500 | 15.1 | 14.72 |

## B. BANK LOAN REPORT | OVERVIEW

### MONTH

SELECT

MONTH(issue_date) AS Month_Number,

MONTHNAME(issue_date) AS Month_Name,

COUNT(id) AS Total_Loan_Applications,

SUM(loan_amount) AS Total_Loan_Funded,

SUM(total_payment) AS Total_Received_Amount

FROM loan

GROUP BY MONTH(issue_date), MONTHNAME(issue_date)

ORDER BY MONTH(issue_date), MONTHNAME(issue_date);

| Month_Number | Month_Name | Total_Loan_Applications | Total_Loan_Funded | Total_Received_Amount |
|---|---|---|---|---|
| 1 | January | 2332 | 25031650 | 27578836 |
| 2 | February | 2279 | 24647825 | 27717745 |
| 3 | March | 2627 | 28875700 | 32264400 |
| 4 | April | 2755 | 29800800 | 32495533 |
| 5 | May | 2911 | 31738350 | 33750523 |
| 6 | June | 3184 | 34161475 | 36164533 |
| 7 | July | 3366 | 35813900 | 38827220 |
| 8 | August | 3441 | 38149600 | 42682218 |
| 9 | September | 3536 | 40907725 | 43983948 |
| 10 | October | 3796 | 44893800 | 49399567 |
| 11 | November | 4035 | 47754825 | 50132030 |
| 12 | December | 4314 | 53981425 | 58074380 |

## STATE

SELECT

    address_state,

    COUNT(id) AS Total_Loan_Applications,
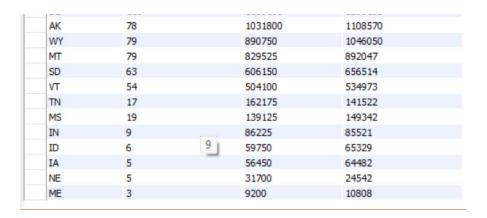
    SUM(loan_amount) AS Total_Loan_Funded,

    SUM(total_payment) AS Total_Received_Amount

FROM loan

GROUP BY address_state

ORDER BY SUM(loan_amount) DESC;

| address_state | Total_Loan_Applications | Total_Loan_Funded | Total_Received_Amount |
|---|---|---|---|
| CA | 6894 | 78484125 | 83901234 |
| NY | 3701 | 42077050 | 46108181 |
| TX | 2664 | 31236650 | 34392715 |
| FL | 2773 | 30046125 | 31601905 |
| NJ | 1822 | 21657475 | 23425159 |
| IL | 1486 | 17124225 | 18875941 |
| VA | 1375 | 15982650 | 17711443 |
| PA | 1482 | 15826525 | 17462908 |
| GA | 1355 | 15480325 | 16728040 |
| MA | 1310 | 15051000 | 16676279 |
| OH | 1188 | 12991375 | 14330148 |
| MD | 1027 | 11911400 | 12985170 |
| AZ | 833 | 9206000 | 10041986 |
| CO | 770 | 8976000 | 9845810 |
| WA | 805 | 8855525 | 9531739 |
| NC | 759 | 8787575 | 9534813 |
| CT | 730 | 8435575 | 9357612 |
| MI | 685 | 7829900 | 8543660 |
| MO | 660 | 7151175 | 7692732 |
| MN | 592 | 6302600 | 6750746 |
| NV | 482 | 5307375 | 5451443 |
| SC | 464 | 5080475 | 5462458 |
| WI | 446 | 5070450 | 5485161 |
| AL | 432 | 4949225 | 5492272 |
| OR | 436 | 4720150 | 4966903 |
| LA | 426 | 4498900 | 5001160 |
| KY | 320 | 3504100 | 3792530 |
| OK | 293 | 3365725 | 3712649 |
| KS | 260 | 2872325 | 3247394 |
| UT | 252 | 2849225 | 2952412 |
| DC | 214 | 2652350 | 2921854 |
| AR | 236 | 2529700 | 2777875 |
| NH | 161 | 1917900 | 2101386 |
| NM | 183 | 1916775 | 2084485 |
| RI | 196 | 1883025 | 2001774 |
| HI | 170 | 1850525 | 2080184 |
| WV | 167 | 1830525 | 1991936 |
| DE | 110 | 1138100 | 1269136 |

| | | | |
|---|---|---|---|
| AK | 78 | 1031800 | 1108570 |
| WY | 79 | 890750 | 1046050 |
| MT | 79 | 829525 | 892047 |
| SD | 63 | 606150 | 656514 |
| VT | 54 | 504100 | 534973 |
| TN | 17 | 162175 | 141522 |
| MS | 19 | 139125 | 149342 |
| IN | 9 | 86225 | 85521 |
| ID | 6 | 59750 | 65329 |
| IA | 5 | 56450 | 64482 |
| NE | 5 | 31700 | 24542 |
| ME | 3 | 9200 | 10808 |

## TERM

SELECT

    term,

    COUNT(id) AS Total_Loan_Applications,

    SUM(loan_amount) AS Total_Loan_Funded,

    SUM(total_payment) AS Total_Received_Amount

FROM loan

GROUP BY term

ORDER BY term;

| term | Total_Loan_Applications | Total_Loan_Funded | Total_Received_Amount |
|---|---|---|---|
| 36 months | 28237 | 273041225 | 294709458 |
| 60 months | 10339 | 162715850 | 178361475 |

## EMPLOYEE LENGTH

SELECT

emp_length,

COUNT(id) AS Total_Loan_Applications,

SUM(loan_amount) AS Total_Loan_Funded,

SUM(total_payment) AS Total_Received_Amount

FROM loan

GROUP BY emp_length

ORDER BY emp_length;

| emp_length | Total_Loan_Applications | Total_Loan_Funded | Total_Received_Amount |
|---|---|---|---|
| < 1 year | 4575 | 44210625 | 47545011 |
| 1 year | 3229 | 32883125 | 35498348 |
| 10+ years | 8870 | 116115950 | 125871616 |
| 2 years | 4382 | 44967975 | 49206961 |
| 3 years | 4088 | 43937850 | 47551832 |
| 4 years | 3428 | 37600375 | 40964850 |
| 5 years | 3273 | 36973625 | 40397571 |
| 6 years | 2228 | 25612650 | 27908658 |
| 7 years | 1772 | 20811725 | 22584136 |
| 8 years | 1476 | 17558950 | 19025777 |
| 9 years | 1255 | 15084225 | 16516173 |

## PURPOSE

SELECT

purpose,

COUNT(id) AS Total_Loan_Applications,

SUM(loan_amount) AS Total_Loan_Funded,

SUM(total_payment) AS Total_Received_Amount

FROM loan

GROUP BY purpose

ORDER BY COUNT(id) DESC;

| purpose | Total_Loan_Applications | Total_Loan_Funded | Total_Received_Amount |
|---|---|---|---|
| Debt consolidation | 18214 | 232459675 | 253801871 |
| credit card | 4998 | 58885175 | 65214084 |
| other | 3824 | 31155750 | 33289676 |
| home improvement | 2876 | 33350775 | 36380930 |
| major purchase | 2110 | 17251600 | 18676927 |
| small business | 1776 | 24123100 | 23814817 |
| car | 1497 | 10223575 | 11324914 |
| wedding | 928 | 9225800 | 10266856 |
| medical | 667 | 5533225 | 5851372 |
| moving | 559 | 3748125 | 3999899 |
| house | 366 | 4824925 | 5185538 |
| vacation | 352 | 1967950 | 2116738 |
| educational | 315 | 2161650 | 2248380 |
| renewable_energy | 94 | 845750 | 898931 |

## HOME OWNERSHIP

SELECT

home_ownership,

COUNT(id) AS Total_Loan_Applications,

SUM(loan_amount) AS Total_Loan_Funded,

SUM(total_payment) AS Total_Received_Amount

FROM loan

GROUP BY home_ownership

ORDER BY COUNT(id) DESC;

| home_ownership | Total_Loan_Applications | Total_Loan_Funded | Total_Received_Amount |
|---|---|---|---|
| RENT | 18439 | 185768475 | 201823056 |
| MORTGAGE | 17198 | 219329150 | 238474438 |
| OWN | 2838 | 29597675 | 31729129 |
| OTHER | 98 | 1044975 | 1025257 |
| NONE | 3 | 16800 | 19053 |