

EXERCISE 01:

QUESTION 1: Get the overall, per region and per LOB NPS from the given dataset. (20pts)

NPS is the percentage of promoters minus the percentage of detractors. Value should be in decimal and not percentage. (e.g. 58.2)

Region	LOB	Promoters	Passives	Detractors	NPS
APAC	LOB 1	1344	135	367	answer
APAC	LOB 2	756	139	150	answer
APAC	LOB 3	759	312	112	answer
NA	LOB 4	1233	98	321	answer
NA	LOB 5	887	203	143	answer
NA	LOB 6	1043	105	245	answer
NA	LOB 7	1101	67	431	answer
NA	LOB 8	645	72	58	answer

	APAC	NA	Overall
NPS	answer	answer	answer

ANSWER FOR QUESTION 1:

The Net Promoter Score(NPS) is a customer service metric that track customer loyalty to a specific brand or service. To calculate NPS, I applied the formula as follow:

$$NPS = \frac{Promoters - Detractors}{Promoters + Passives + Detractors} * 100$$

The result of NPS for each LOB is presented in the **Table 1**. The result of NPS per region and overall NPS is presented **Table 2**.

Region	LOB	Promoters	Passives	Detractors	NPS
APAC	LOB 1	1344	135	367	53
APAC	LOB 2	756	139	150	58
APAC	LOB 3	759	312	112	55
NA	LOB 4	1233	98	321	55
NA	LOB 5	887	203	143	60
NA	LOB 6	1043	105	245	57
NA	LOB 7	1101	67	431	42
NA	LOB 8	645	72	58	76

	APAC	NA	Overall
NPS	166	116	456

QUESTION 2: With 60 NPS target, which LOB passed (5pts)

ANSWER FOR QUESTION 2:

To find out which LOB passed, I used IF function in excel and set the condition at follow:

```
IF NPS>=60:
    print "Passed"
Else:
    print "Failed"
```

Applied the Function IF to **Table 1**, I got the result passed LOB in **Table 3** as Follow:

Region	LOB	Promoters	Passives	Detractors	NPS	Status
APAC	LOB 1	1344	135	367	53	Failed
APAC	LOB 2	756	139	150	58	Failed
APAC	LOB 3	759	312	112	55	Failed
NA	LOB 4	1233	98	321	55	Failed
NA	LOB 5	887	203	143	60	Passed
NA	LOB 6	1043	105	245	57	Failed
NA	LOB 7	1101	67	431	42	Failed
NA	LOB 8	645	72	58	76	Passed

Table 3 shows **LOB 5 and LOB 8** passed the 60 NPS target

QUESTION 3: Which LOB underperformed but achieved at least 90% of the target (5pts)

ANSWER FOR QUESTION 2:

LOB needs to meet two conditions: underperformed and achieved at least 90% target.

I applied IF and AND function in Excel and set the condition at follow:

```
IF (NPS>=54) AND (NPS<60):
    print "Passed"
```

```
Else:
    print "Not meet the condition "
```

Applied the Function IF to **Table 1**, I got the result passed LOB in **Table 4** as Follow:

Region	LOB	Promoters	Passives	Detractors	NPS	Status
APAC	LOB 1	1344	135	367	53	Not meet the condition
APAC	LOB 2	756	139	150	58	Passed
APAC	LOB 3	759	312	112	55	Passed
NA	LOB 4	1233	98	321	55	Passed
NA	LOB 5	887	203	143	60	Not meet the condition
NA	LOB 6	1043	105	245	57	Passed
NA	LOB 7	1101	67	431	42	Not meet the condition
NA	LOB 8	645	72	58	76	Not meet the condition

Table 4 shows **LOB 2, LOB 3, LOB 4, and LOB 6** are the underperformed LOB but achieved at least 90% of the target