①

Q.1.A	1- TRUE	6-TURE
	2-FALSE	7-FALSE
	3- TRUE	8-FALSE
	4- FALSE	9-T
	5-TRUE	10-F

Q.1.A	1-E	6-C
	2-F	7-D
	3-A	8-G
	4-J	9-B
	5-I	10-H

Q.2 A

CONVENTIONAL METHOD

particulars	X	Y	Z
MATERIALS	20	12	25
LABOR	6*0.5= 3	9	6
PROD OH	28*1.5= 42	28	84
TOTAL PROD CPU	65	49	115

MACHINE HOUR OH
X- 750*1.5*28= 31500
Y-1250*1*28= 35000
Z-7000*3*28= 588000

PARTICULARS	SET UP COST	MACHINE COST	MACHINE HANDLING COST	INSPECTION EXP
COST	(654000*35%) 229075	130900(20%)	98175(15%)	196350 (30%)
COST DRIVER	NO.OF SET UP	MACHINE HOUR	NO. OF MOVEMENT	NO.OF INSPECTION
COST DRIVER RATE	229075/670 =341.9	130900/23375= 5.6	98175/120= 818.125	196350/1000= 196.35

CUP under ABC COSTING

OHs	X	Y	Z
SETUP COST	75*341.9= 25643	115*341.9= 39319	480*341.9= 164112
MACHINE	750*1.5*5.6= 6300	1250*1*5.6= 7000	7000*3*5.6= 117600
MACHINE HANDLING	12*818.125= 9818	21*818.125= 17181	87*818.125= 71177
INSPENCTIN	150*196.35= 29453	180*196.35= 35343	670*196.35= 131555
TOTAL	71214	98843	484444
CPU	94.95	79.07	69.21

Q.2.B

DIVISION MANGO JUICE PARCHASE FROM MANGO PULP

PARTICULARS	MANGO PULP	MANGO JUICE	TOTAL FOR COMPANY
SALE OUTSIDE		800000	800000
SALES TO DIV MANGO JUICE	440000		440000
TOTAL SALES	440000	800000	1240000
LESS: TRANSFER FROM DIV		440000	440000
LESS : VC	380000	300000	680000
LESS : FC	40000	20000	60000
PROFIT	20000	40000	60000

II)

A) IF MANGO JUICE PURCHASE FROM OPEN MARKET

PARTICULARS	MANGO JUICE
SALES TO OUTSIDE	800000
LESS: VC	300000
LESS: PURCHASE OF COMPONANT	400000
LESS: FC	20000
PROFIT OF DIV MANGO JUICE	80000
LESS:FC OF DIV PULP	(40000)
PROFIT OF THE COMPANY	40000

DIV MANGO JUICE SHOULD PURCHASE FROM DIVISION MANGO PULP SINCE THE PROFIT OF THE COAMPNY IS MAXIMUM

B)

PARTICULARS	MANGO JUICE
SALES TO OUTSIDE	800000
LESS: VC	300000
LESS: PURCHASE OF COMPONANT	400000
LESS: FC	20000
PROFIT OF DIV MANGO JUICE	80000
SAVINGS IN COST FOR DIV PULP	30000
LESS:FC OF DIV PULP	(40000)
PROFIT OF THE COMPANY	70000

DIV MANGO JUICE SHOULD PURCHASE FROM OUTSIDE MARKET

C)

PARTICULARS	MANGO JUICE
SALES TO OUTSIDE	800000
LESS: VC	300000
LESS: PURCHASE OF COMPONANT	370000
LESS: FC	20000
PROFIT OF DIV MANGO JUICE	110000
LESS:FC OF DIV PULP	(40000)
PROFIT OF THE COMPANY	70000

DIV MANGO JUICE SHOULD PURCHASE FROM OUTSIDE MARKET

D) TP IF DIV. MANGO JUICE DECIDES TO BUY FROM DIV MANGO PULP SHOULD BE VC OF DIV. MANGO PULP RS. 190 PER UNIT

Q.2C

FACTORS AFFECTING TP-

- NATURE OF INDUSTRY
- ORG. STRUCTURE
- CULTRE PREVAIL
- ROLE OF CORPORATE OFFICE
- BUYERS OR SELLERS MARKET

- CAPACITY UTILISATION
- TYPE OF INTEGRATAION THE COMPANY HAS
- EXTENT OF NEGOTIATION
- TYPE OF MFG PROCESS

Q.3 A

particulars	CPU	TOTAL FOR 10000 UNITS
SALES	100	1000000
LESS: VC	50	500000
CONTRIBUTION	50	500000
LESS:FC		
SALARY		2,40,000
OFFICE COST		1,60,000
ADV COST		80,000
PROFIT		20000

A) P/V RATION-(CONT/SALES)*100- (500000/1000000)*100= 50%

B) 1) BEP (UNITS)- FC/ CONT CPU- 480000/50- 9600 UNITS

2) BEP (RS.)- FC/P/V= 480000/50%= 960000

3) MOS(RS)= ACUTAL – BEP-= 1000000-960000=40000
4) MOS (UNITS)= ACUTAL – BEP= 10000-9600= 400

C) IF 12000 UNITS SOLD

PARTICULARS	RS.
SALES	1200000
LESS:VC	600000
CONTRIBUTIONS	600000

LESS:FC	480000
PROFIT	120000

D) PRICE INCREASE TO 10% AND SALARY 30000

Particulars	CPU	TOTAL FOR 10000 UNITS
SALES	110	1100000
LESS: VC	50	500000
CONTRIBUTION	60	600000
LESS:FC		
SALARY		300000
OFFICE COST		160000
ADV COST		80000
PROFIT		60000

(PV RATIO=600000/1100000=54.54%)

BEP (UNITS)- FC/ CONT CPU- 540000/60- 9000 UNITS

2) BEP (RS.)- FC/P/V= 540000/54.545454%=990000

E)
FOR YEAR 2016

Particulars	CPU	TOTAL FOR 10000 UNITS
SALES	100	1280000
LESS: VC	50	640000
CONTRIBUTION	50	640000
LESS:FC		
SALARY		240000
OFFICE COST		160000
ADV COST		80000
PROFIT		160000

SALES REQUIRED TO EARN DESIRED PROFIT- FC+DP/PV RATIO
(480000 +160000)/54%- 1280000

Q.3B

STATEMENT OF CONTRIBUTION

LEVEL SALES	50%	60%	70%	80%	90%	100%
SP CUP	2	1.8	1.6	1.5	1.25	1.2
VC	1	1	1	1	1	1
CONTRIBUTION	1	0.8	0.6	0.5	0.25	0.2
TOTAL CONTRIBUTION	25000	24000	20000	20000	11250	10000
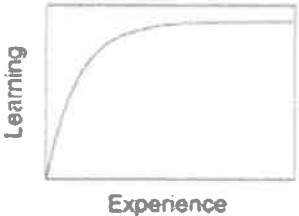
CONTRIBUTION IS MAX AT 50%

STATEMENT OF PROFITABILITY

PARTICULARS	50%	60%	70%	80%	90%	100%
TOTAL CONTRIBUTION	25000	24000	20000	20000	11250	10000
LESS:FC	20000	20000	20000	22000	23000	24000
PROFIT/LOSS	5000	4000	1000	(2000)	(11750)	(14000)

MAX PROFIT AT 50%

Q.4.A

1. Sales Value Variance- (AQ*AR)- (SQ*SR)

SOUP	(440*36)- (600*30)- 2160 A
OIL	1600 F
CREAM	20320 F

2. Sales Volume Variance- (AQ-RSQ)*SQ

SOUP	(440-600)*30=4800 A
OIL	1600 F
CREAM	25600 F

3. Sales Price Variance- (AQ-SQ)*AR

SOUP	(36-30)440= 2640 F
OIL	0
CREAM	5280

4. Sales Mix Variance- (AQ- RSQ)*SR

SOUP	(440-660)*30= 6600A
OIL	0
CREAM	17600

5. Sales Quantity Variance- (RSQ-SQ)*SR

SOUP	(660-600)*30= 1800F
OIL	1600F
CREAM	8000F

REVISED SELLING QUANTITY
(SALES QTY*TOTAL QUT OF AQ)/TOTAL SDT QUTY

SOUP	(600*2200)/2000= 660
OIL	440
CREAM	1100

Q.3 C

A learning curve is a graphical representation of how an increase in learning (measured on the vertical axis) comes from greater experience (the horizontal axis); or how the more someone (or something) performs a task, the better they get at it. In 1936 T. P Wright described the effect of learning on production costs in the aircraft industry

Average is smooth

Learning / Experience

q.4 a

2. Sales Value Variance- (AQ*AR)- (SQ*SR)

SOUP	(440*36)- (600*30)- 2160 A
OIL	1600 F
CREAM	20320 F

2. Sales Volume Variance- (AQ-RSQ)*SQ

SOUP	(440-600)*30=4800 A
OIL	1600 F
CREAM	25600 F

3. Sales Price Variance- (AQ-SQ)*AR

SOUP	(36-30)440= 2640 F
OIL	0
CREAM	5281

6. Sales Mix Variance- (AQ- RSQ)*SR

SOUP	(440-660)*30= 6600A
OIL	0
CREAM	17600

7. Sales Quantity Variance- (RSQ-SQ)*SR

SOUP	(660-600)*30= 1800F
OIL	1600F
CREAM	8000F

REVISED SELLING QUANTITY
(SALES QTY*TOTAL QUT OF AQ)/TOTAL SDT QUTY

SOUP	(600*2200)/2000= 660
OIL	440
CREAM	1100

Q.4 B

Particulars	Budget	Actual	VARAINCE
Sales	200	185	15A
LESS: Material and other variable cost	120	109	11F
Fixed cost	30	30	0
Sales promotion	10	7	3F
Operating profit	**40**	**39**	1A
Net working capital	100	103	3F
Fixed assets	40	37	3A
PROFITABILITY RATIO=(PROFIT/SALES)*100	40*100/200= 20%	21%	
RETURN ON INVESTMENT PROFIT/TOTA(L ASSET)*100	28.75%	27.85%	

Q.5 A

DMAIC Approach-DEFINE-MEASURE- ANALYSE- IMPROVE- CONTROL

Write steps

Q.5 B

Product Life cycle costing- acquisition cost- operating cost- disposal cost—categories of product life cycle cost.- stages of product life cycle- introduction- growth- maturity- saturation- decline

Q.5 1

Benchmarking- Benchmarking is a process of measuring the performance of a company's products, services, or processes against those of another business considered to be the best in the industry, aka "best in class.- TYPES-(Competitive, internal, functional, generic)BENEFITS-STEPS

Q.5 2

Objectives of cost Audit MEANING- Cost Audit represents the verification of cost accounts and check on the adherence to cost accounting plan. Cost Audit ascertain the accuracy of cost accounting records to ensure that they are in conformity with Cost Accounting principles, plans, procedures and objective

	Prospective Objective- Constructive Objectives Making of accurate periodical financial statements Help in determining prices of finished products Determination accurate cost of jobs Help in planning, operations and stock control Distribution of overhead costs in a rational manner
Q.5 3	Total Quality Management- meaning- A core definition of total quality management (TQM) describes a management approach to long-term success through customer satisfaction. In a TQM effort, all members of an organization participate in improving processes, products, services, and the culture in which they work.- features- process
Q.5 4	Advantages and Disadvantages Standard Costing

Advantages and Disadvantages Standard Costing

Advantages	Disadvantages
• Valuable guidance to mgt • Helps to promote labor efficiency • Helps in valuation of closing inventory • Design incentive system for employees • Timely and effective control	• Controversial materiality limits for variances. • Nonreporting of certain variances. • Low morale for some workers.

Q.5 5	Transfer Pricing Methods- market price-cost price- dual price- two step price- prorating overall contribution- negotiated prices