

LAB ASSIGNMENT – 4

Q.1 Use INDEX and MATCH to find the sales for Product C in March.

ANS. =INDEX(D2:H7,MATCH(B4,B2:B7,0),3)

ProductID	Product	Category	Jan Sales	Feb Sales	Mar Sales	Apr Sales	May Sales	QUESTION 1.
101	PROD A	Electronics	120	130	140	150	160	220
102	PROD B	Furniture	150	160	170	180	190	
103	PROD C	Electronics	200	210	220	230	240	
104	PROD D	Clothing	90	100	110	120	130	
105	PROD E	Furniture	220	230	240	250	260	
106	PROD F	Electronics	130	140	150	160	170	

Q.2 Use INDEX and MATCH to find the category for Product E

ANS. =INDEX(C2:C7, MATCH(B5, B2:B7, 0))

ProductID	Product	Category	Jan Sales	Feb Sales	Mar Sales	Apr Sales	May Sales	QUESTION 2.
101	PROD A	Electronics	120	130	140	150	160	Clothing
102	PROD B	Furniture	150	160	170	180	190	
103	PROD C	Electronics	200	210	220	230	240	
104	PROD D	Clothing	90	100	110	120	130	
105	PROD E	Furniture	220	230	240	250	260	
106	PROD F	Electronics	130	140	150	160	170	

Q.3 Use INDEX and MATCH to find the maximum sales for Product B across all months.

ANS. =MAX(INDEX(D2:H7,MATCH(B3,B2:B7,0),0))

ProductID	Product	Category	Jan Sales	Feb Sales	Mar Sales	Apr Sales	May Sales	QUESTION 3.
101	PROD A	Electronics	120	130	140	150	160	190
102	PROD B	Furniture	150	160	170	180	190	
103	PROD C	Electronics	200	210	220	230	240	
104	PROD D	Clothing	90	100	110	120	130	
105	PROD E	Furniture	220	230	240	250	260	
106	PROD F	Electronics	130	140	150	160	170	

Q.4 Use INDEX and MATCH to find the month with the maximum sales for Product A.

ANS. =INDEX(D1:H1, MATCH(MAX(INDEX(D2:H7, MATCH(B2, B2:B7, 0), 0)), INDEX(D2:H7, MATCH(B2, B2:B7, 0), 0), 0)), =INDEX(D2:H2, MATCH(MAX(INDEX(D3:H8, MATCH(B3, B3:B8, 0), 0)), INDEX(D3:H8, MATCH(B3, B3:B8, 0), 0), 0))

ProductID	Product	Category	Jan Sales	Feb Sales	Mar Sales	Apr Sales	May Sales	QUESTION 4.
101	PROD A	Electronics	120	130	140	150	160	May Sales
102	PROD B	Furniture	150	160	170	180	190	
103	PROD C	Electronics	200	210	220	230	240	
104	PROD D	Clothing	90	100	110	120	130	
105	PROD E	Furniture	220	230	240	250	260	
106	PROD F	Electronics	130	140	150	160	170	

Q.5 Use INDEX, MATCH, and SUMIF to sum the sales for all products in the "Electronics" category for April.

ANS. =SUMIF(C2:C7, C2, INDEX(D2:H7, , MATCH(G1, D1:H1, 0)))

ProductID	Product	Category	Jan Sales	Feb Sales	Mar Sales	Apr Sales	May Sales	QUESTION 5.
101	PROD A	Electronics	120	130	140	150	160	540
102	PROD B	Furniture	150	160	170	180	190	
103	PROD C	Electronics	200	210	220	230	240	
104	PROD D	Clothing	90	100	110	120	130	
105	PROD E	Furniture	220	230	240	250	260	
106	PROD F	Electronics	130	140	150	160	170	

Q.6 Use INDEX and MATCH to calculate the average sales for Product D across all months.

ANS. =AVERAGE(INDEX(D2:H7, MATCH(B5, B2:B7, 0), 0))

ProductID	Product	Category	Jan Sales	Feb Sales	Mar Sales	Apr Sales	May Sales	QUESTION 6.
101	PROD A	Electronics	120	130	140	150	160	110
102	PROD B	Furniture	150	160	170	180	190	
103	PROD C	Electronics	200	210	220	230	240	
104	PROD D	Clothing	90	100	110	120	130	
105	PROD E	Furniture	220	230	240	250	260	
106	PROD F	Electronics	130	140	150	160	170	

Q.7 Use INDEX and MATCH to find the sales for Product ID 105 in May.

ANS. =INDEX(D2:H7, MATCH(A6, A2:A7, 0), MATCH(H1, D1:H1, 0))

ProductID	Product	Category	Jan Sales	Feb Sales	Mar Sales	Apr Sales	May Sales	QUESTION 7.
101	PROD A	Electronics	120	130	140	150	160	260
102	PROD B	Furniture	150	160	170	180	190	
103	PROD C	Electronics	200	210	220	230	240	
104	PROD D	Clothing	90	100	110	120	130	
105	PROD E	Furniture	220	230	240	250	260	
106	PROD F	Electronics	130	140	150	160	170	

Q.8 Use INDEX and MATCH to create a dynamic lookup where the user can input a product and a month, and the formula returns the corresponding sales.

ANS. =INDEX(D2:H7,MATCH(Q2,B2:B7,0),MATCH(Q3,D1:H1,0))

ProductID	Product	Category	Jan Sales	Feb Sales	Mar Sales	Apr Sales	May Sales	QUESTION 8.
101	PROD A	Electronics	120	130	140	150	160	PROD A
102	PROD B	Furniture	150	160	170	180	190	May Sales
103	PROD C	Electronics	200	210	220	230	240	160
104	PROD D	Clothing	90	100	110	120	130	
105	PROD E	Furniture	220	230	240	250	260	
106	PROD F	Electronics	130	140	150	160	170	