Unit 5 - Week 3 : Digital Image Processing-I

Assignment 3

The due date for submitting this assignment has passed.
As per our records you have not submitted this assignment.

Due on 2019-09-18, 23:59 IST.

1) How does agricultural lands appear in an image displayed in standard FCC? *2 points*

(a.) Red
(b.) Blue
(c.) Green
(d.) Yellow

No, the answer is incorrect.
Score: 0
Accepted Answers:
(a.) Red

2) The Logarithmic Contrast Stretching is mostly used for _____. *2 points*

(a.) Brighter parts of images
(b.) Darker parts of images
(c.) Higher difference in grey levels
(d.) Lower difference in grey levels

No, the answer is incorrect.
Score: 0
Accepted Answers:
(a.) Brighter parts of images

3) What is the advantage of piece-wise enhancement technique? *3 points*

(a.) Is applied when there is high contrast in grey levels
(b.) Different enhancement techniques can be applied for different parts of the image
(c.) Divides the image into pieces and applies an enhancement technique
(d.) Is applied for highly heterogeneous land use

No, the answer is incorrect.
Score: 0
Accepted Answers:
(b.) Different enhancement techniques can be applied for different parts of the image

4) The image of an urban area has _____spatial frequency. *2 points*

(a.) Low
(b.) Constant
(c.) High
(d.) Linear

No, the answer is incorrect.
Score: 0
Accepted Answers:
(c.) High

5) The salt pepper effect in an image can be reduced by _____. *2 points*

(a.) Spatial Filtering
(b.) Image Enhancement
(c.) Thresholding
(d.) None of the above

No, the answer is incorrect.
Score: 0
Accepted Answers:
(a.) Spatial Filtering

6) Why smaller kernel sizes are more meaningful? *3 points*

(a.) Less time to process
(b.) Less Generalization
(c.) Less Ambiguity
(d.) All of the above

No, the answer is incorrect.
Score: 0
Accepted Answers:
(c.) Less Ambiguity

7) Density slicing method can be used for distinguishing the different features in an image into different classes. *2 points*

(a.) True
(b.) False

No, the answer is incorrect.
Score: 0
Accepted Answers:
(a.) True

8) What is the disadvantage of the convolution technique? *2 points*

(a.) Image size decreases
(b.) The image becomes blur
(c.) Selective features are improved
(d.) None of the above

No, the answer is incorrect.
Score: 0
Accepted Answers:
(a.) Image size decreases

9) Which filtering technique reduces noise and ignores smaller details in the image? *2 points*

(a.) Laplacian filter
(b.) Sharpening
(c.) Smoothening
(d.) Sigma Filter

No, the answer is incorrect.
Score: 0
Accepted Answers:
(c.) Smoothening

10) What is the output value for the highlighted DN value after performing linear stretching of the given 16-bit data? *6 points*

10080	11634	11607	11862	11560
10560	11237	11891	11762	11360
10783	11300	11552	11970	12050
11245	11468	11678	11865	12460
11482	11651	11960	12510	12875

(a.) 12620
(b.) 26585
(c.) 33298
(d.) 41853

No, the answer is incorrect.
Score: 0
Accepted Answers:
(d.) 41853

11) In image sharpening technique the elements in the mask contain both positive and negative weights. *2 points*

(a.) True
(b.) False

No, the answer is incorrect.
Score: 0
Accepted Answers:
(a.) True

12) Edge detection technique is important for _____. *2 points*

(a.) Features with prominent geometry
(b.) Images with low contrast
(c.) Homogeneous images
(d.) All the above

No, the answer is incorrect.
Score: 0
Accepted Answers:
(a.) Features with prominent geometry

13) What will be the output of a 3×3 average filter of the given image? *5 points*

41	32	24	52	44
29	36	49	32	55
22	41	31	25	32

(a.)

	34	36	38	

(b.)

		33	35	37

(c.)

		32		
		34		
		36		

(d.)

	30			
		32		
			34	

No, the answer is incorrect.
Score: 0
Accepted Answers:
(a.)

	34	36	38	

14) Determine the Histogram Equalized values of Digital Number 32. *10 points*

24	47	31	20	36	52	29	44
41	52	25	44	53	31	24	50
38	45	50	35	22	41	47	33
55	20	27	52	45	25	38	42
49	51	41	32	24	52	44	29
24	42	29	36	49	32	55	22
44	50	22	41	31	25	32	41
29	33	20	55	49	38	45	24

(a.) 79
(b.) 92
(c.) 100
(d.) 105

No, the answer is incorrect.
Score: 0
Accepted Answers:
(b.) 92