

Unit 7 - Week 5

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Assignment 5

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

Due on 2019-09-04, 23:59 IST.

1) Irrigation efficiency in a drip irrigation system is

1 point

- a. 30-35%
- b. 50-60%
- c. 90-95%
- d. none

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

c.

2) The condition of drop size when the index of jet break-up greater than 4, is

1 point

- a. Poor
- b. Best
- c. Good
- d. Wasted

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

d.

3) In the emitter discharge formula ($Q = kp^x$), the $x = 0.5$ is considered for

1 point

- a. Orifice type
- b. Laminar flow
- c. Pressure compensating
- d. All

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

a.

4) The total pressure variation considered in the sprinkler's laterals is

1 point

- a. <20%
- b. >20%
- c. <10%
- d. >10%

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

a.

5) The emission uniformity of point source emitters in arid regions having slope >2 % is

1 point

- a. 70 to 85%
- b. 85 to 90 %
- c. 90 to 95%
- d. none of the above

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

b.

6) Determine the required capacity (in lps) of an individual sprinkler spaced at 12 m on a lateral line to apply water at a rate of 0.0125 m/h. The spacing between lateral lines is 18 m.

1 point

- a. 0.0075
- b. 0.075
- c. 0.75
- d. 75

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

c.

7) Determine the system's capacity (in lps) for a sprinkler irrigation system to irrigate 16 hectares of maize crop. Design moisture use rate is 5 mm per day, and irrigation efficiency is 70%. Irrigation period is ten days in a 12-day interval, and the system was operated for 20 hours a day.

1 point

- a. 1.906
- b. 19.06
- c. 190.6
- d. 1906.0

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

b.

8) Determine the emission uniformity of a drip system section that uses two emitters for each plant with coefficient of discharge (k) = 0.3, exponent (x) = 0.57 and coefficient of variation (C_v) = 0.06. The average pressure is 120 kPa, and the minimum pressure is 90 kPa.

1 point

- a. 80 - 81%
- b. 70 - 71%
- c. 77 - 78%
- d. 64 - 66%

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

a.

9) If the daily pan evaporation, pan coefficient, wetting factor (crop canopy factor) and crop coefficient of 5 m × 5 m spaced orchard plantation are 6 mm, 0.8, 0.6 and 0.6, respectively, and four drippers each of 4 l/h discharge are used to irrigate each plant, the time of operation of drip irrigation system in hours is

1 point

- a. 3.7
- b. 1.7
- c. 4.7
- d. 2.7

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

d.

10) Several identical sprinkler nozzles, each having discharge Q (liter per minute), are spaced in a grid of size L (meter) × S (meter). The application rate in mm/sec is _____

1 point

- a. $I = \frac{60 Q \left(\frac{mm^3}{sec}\right)}{L(mm) \times S(mm)}$
- b. $I = \frac{3600 Q \left(\frac{mm^3}{sec}\right)}{L(mm) \times S(mm)}$
- c. $I = \frac{0.17 Q \left(\frac{mm^3}{sec}\right)}{L(mm) \times S(mm)}$
- d. $I = \frac{0.017 Q \left(\frac{mm^3}{sec}\right)}{L(mm) \times S(mm)}$

- a.
- b.
- c.
- d.

No, the answer is incorrect.

Score: 0

Accepted Answers:

d.