

Direction

- 1) Hypertension can lead to all of the following conditions, except for:
 - a. Stroke
 - b. Cardiovascular diseases
 - c. Liver diseases
 - d. Kidney diseases
- 2) For which of the following parameters, there was no significant difference between sham, captopril, and losartan groups?
 - a. Heart matrix
 - b. Heart weight
 - c. Heart volume
 - d. Number of cardiomyocytes
- 3) Which of the following is not related to elevated serum levels of angiotensin II?
 - a. Increased expression of proto-oncogenes
 - b. Increased growth factor C
 - c. Increased myocardial volume
 - d. Increased number of myocardial cells
- 4) Which of the following characteristics is attributed to increased endocardial volume in the animal model of renovascular hypertension?
 - a. Subendocardial fibrosis
 - b. Increased number of Purkinje cells
 - c. Increased vascular volume
 - d. Increased epithelial volume
- 5) The main difference between captopril and losartan functions is due to the difference in the action of which mechanism?
 - a. Inhibition of bradykinin
 - b. Inhibition of angiotensin-converting enzyme (ACE)
 - c. Blocking angiotensin II receptors
 - d. None of the above
- 6) Which of the following is first involved in hypertensive cardiac hypertrophy?
 - a. Perivascular tissue
 - b. Myocytes
 - c. Interstitial matrix
 - d. Nerve fibers
- 7) Which stereological method was used for cell counting?
 - a. Cavalieri
 - b. IUR method
 - c. Optical dissector method
 - d. All of the above
- 8) What is captopril known for?
 - a. Angiotensin I receptor blocker
 - b. Angiotensin II receptor blocker
 - c. Angiotensin-converting enzyme inhibitor
 - d. Renin blocker
- 9) What is the title of “a renal artery occlusion and induction of hypertension” in the article?
 - a. Spontaneous hypertension
 - b. Two-kidney, one-clip (2K1C)
 - c. One-kidney, one clip (1K1C)
 - d. Fawn-hooded hypertension

- 10) Which of the following is most effective in reducing myocardial loss in hypertension?
 - a. Losartan 50
 - b. Losartan 25
 - c. Captopril 50
 - d. Captopril 100

- 11) For how long were captopril and losartan administered to animals?
 - a. 1 week
 - b. 2 weeks
 - c. 3 weeks
 - d. 4 weeks

- 12) Which method was used to measure blood pressure?
 - a. Tail-cuff plethysmography
 - b. Intra-arterial catheters
 - c. Radiotelemetry
 - d. A and B

- 13) Which method was used to measure the primary volume of the heart?
 - a. Point-counting
 - b. Immersion
 - c. Optical dissector
 - d. IUR

- 14) For counting cardiomyocytes and Purkinje cells, the paraffin-embedded hearts were serially cut to which thickness?
 - a. 5 μm
 - b. 15 μm
 - c. 20 μm
 - d. 25 μm