- 1. Which of the following is not a subspace of R3?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 2. Which of the following is a subspace of R4?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 3. Which of the following is not a subspace of P2?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 4. Which of the following is a subspace of M22?
- A. The set of all matrices with trace 0
- B. The set of all matrices with determinant 0
- C. The set of all matrices with rank 1
- D. The set of all matrices with rank 2
- 5. Which of the following is not a subspace of C[0,1]?
- A. The set of all continuous functions
- B. The set of all differentiable functions
- C. The set of all integrable functions
- D. The set of all bounded functions
- 6. Which of the following is a subspace of L2[0,1]?
- A. The set of all continuous functions
- B. The set of all differentiable functions
- C. The set of all integrable functions
- D. The set of all bounded functions
- 7. Which of the following is not a subspace of S[0,1]?
- A. The set of all continuous functions
- B. The set of all differentiable functions
- C. The set of all integrable functions
- D. The set of all bounded functions
- 8. Which of the following is a subspace of V?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 9. Which of the following is not a subspace of W?

- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 10. Which of the following is a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 11. Which of the following is not a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 12. Which of the following is a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 13. Which of the following is not a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 14. Which of the following is a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 15. Which of the following is not a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 16. Which of the following is a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 17. Which of the following is not a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0

- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 18. Which of the following is a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 19. Which of the following is not a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 20. Which of the following is a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 21. Which of the following is not a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 22. Which of the following is a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 23. Which of the following is not a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 24. Which of the following is a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0
- 25. Which of the following is not a subspace of VxW?
- A. The set of all vectors with z-coordinate 0
- B. The set of all vectors with y-coordinate 0
- C. The set of all vectors with x-coordinate 0
- D. The set of all vectors with x-coordinate 0 and y-coordinate 0

- 1. D 2. A 3. C 4. A 5. D 6. D 7. C 8. D 9. C 10. D 11. C 12. A 13. B 14. B 15. A 16. C 17. B 18. A 19. D 20. B 21. A 22. C 23. B 24. D 25. A