**Java Question Bank**

1. Define UNICODE.

2. Define Byte code.

3. Explain JDK root directory with diagram.

4. Discuss five keywords of Java with example.

5. Discuss the diamond problem with reference to inheritance.

6. Difference between finally, finalize and final keyword.

7. Discuss the generation of languages.

8. How is platform independence achieved in Java?

9. Explain: Class, Encapsulation, Inheritance and Polymorphism.

10. List the commonly found tools available as part of JDK which are not part of JRE?

11. Difference between primitive and reference types.

12. Discuss two types of byte ordering with example. Mention the difference between the two.

13. Why should we have util package?

14. Explain Method Overloading in Java.

15. Explain Constructors in Java.

16. Explain static variables and static methods in Java.

17. Discuss the purpose of final keyword and its advantages.

18. Discuss finalize method and its importance in garbage collection in Java.

19. Define instance/member variables.

20. Define functional programming.

21. Why was Lambda expressions introduced?- pg 510 oracle corporation java

22. Discuss Lambda expressions and its implementation in Java. (Pg 510, 2nd paragraph oracle corp book)

23. Discuss the benefit of generic over non-generic types. – (pg 472 , Oracl corp book)

24. Explain Thread Life-cycle with diagram. (Given by Mam)

25. Compare concurrency and parallelism with reference to multithreading in Java. (pg.428 oracle corp book)

26. Difference between multitasking and multithreading with reference to threads in Java. (pg.403 oracle corp book)

27. What are threads good for? (pg.404 oracle crop book)

28. Discuss Application Thread with example. (pg. 616 orcle crop book) doubt

29. When should we extend Thread class and when should we implement Runnable interface in Java? (.2nd question on page no 765 from ivor Horton ) (thread class on page no 405 from A java biggeners book )

30. Difference between isAlive() and join() in Java. (pg.733 from ivor Horton)

31. Explain immutable objects with reference to Threads.

32. Difference between ‘==’ and equals() in Java. (Sessional -1)

33. Compare String and StringBuilder class with methods. (Sessional -1)

34. Compare boxing and unboxing in Java. Also define auto boxing. (Sessional -1)

35. Difference between Byte Streams and Character Streams. (pg 361 of oracle crop book) (Given By Mam)

36. Discuss any five byte stream classes. (pg 362 of oracle crop book)

37. Discuss predefined streams of Java. (pg. 363 of oracle crop book )

38. Difference between channel and heap.

39. Discuss situations where String Tokenizer class is used. ( link-> https://docs.oracle.com/javase/7/docs/api/java/util/StringTokenizer.html)

40. Discuss Exception and types of Exceptions in Java.(pg.no 340-342 Ivor Horton and (search pgno. (371-373)/1501 ))

41. Differentiate Interface and Polymorphism. .(pg.no 372 Ivor Horton and (search pgno. (358)/1501 ))

42. Differentiate Multiple Inheritance and Interface. .(pg.no 327 Ivor Horton and (search pg no. (357)/1501 ))

43. Discuss BinaryStream and CharacterStream. .(pg.no 374 Ivor Horton and (search pg no. (405)/1501 ))

44. Discuss three subclasses of Error Runtime Exception. (pg. 341 Ivor Horton)

45. Discuss classes for input and output in Java. (pg. 345 Ivor Horton)

46. Discuss methods for input and output in Java. (pg. 346 Ivor Horton)

47. Explain seven different subclasses of InputStream. (pg. 377 Ivor Horton (search pgno. 406 ))

48. Discuss methods of OutputStream class. (pg. 364 Oracle crop book)

49. Discuss base classes for StreamReader and StreamWriter alongwith their methods. (Ans in links )

1)Reader: -> https://docs.oracle.com/javase/8/docs/api/java/io/Reader.html

2)Writer:-> https://docs.oracle.com/javase/8/docs/api/java/io/Writer.html

50. How to customize a StringTokenizer?

51. Which tokens can a StringTokenizer recognize in its default state? (link -> <https://docs.oracle.com/javase/8/docs/api/java/util/StringTokenizer.html> )

52. Explain Locale class. (pg. 428 Ivor Hoton)

53. Compare absolute path and relative path. (pg. 435 Ivor Horton)

54.Discuss the methods of File object OR Explain reading and writing in files in Java. (pg. 439 Ivor Horton)

55. Explain channels with reference to file-handling in Java. (pg. 461 Ivor Horton)

56. Explain serializing objects in Java. (pg. 579 Ivor Horton )

57. What are generic class types? (pg. 472 of java oracle press) (pg. 579 Ivor Horton)

58. What are generic constructors? (pg. 626 Ivor Horton)

59. Define Threads.Differentiate Daemon Threads and User Threads. ( Define pg.756 Ivor Horton nd User vs Daemon pg.760 Ivor Horton )

60. Discuss thread scheduling with example. (pg. 764 Ivor Horton)

61. Explain Synchronization and Deadlocks in threading. (Synchronization pg. 737 of Ivor Book (search pg.768) && (Deadlocks pg. 755 of Ivor Book and (search pg.786)))

62. Discuss methods used in thread communication. (pg. 756 Ivor Book (search pg. 787))

63. Explain thread priorities. (pg. 761 Ivor Horton (search pgno.792))

64. Discuss inter-process communication.

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65. Discuss the most frequent packages in JDK (pg 23 Ivor Horton)

66. Q. on pg. 541 oracle press java book

67 Discuss or explain the general form of generic class wIth example or with syntax ( pg 479 oracle corp book)

68. Define Bounded Types. (pg. 479 of oracle press java book)

69.Define Generic Method (pg.488 of oracle press java book)

70. Discuss Comparator and Comparable. (below link)

1) https://docs.oracle.com/javase/8/docs/api/java/util/Comparator.html

2) <https://docs.oracle.com/javase/tutorial/collections/interfaces/order.html>

3) https://docs.oracle.com/javase/8/docs/api/java/lang/Comparable.htm