

Oracle Database 11g: Performance Tuning

1. Examine the following query and its output:

A. Library cache misses happened 118 times because invalidations occurred due to DDL on the dependant objects.

B. About 24% of the parse calls were able to find a cursor to share.

C. Reparsing of SQL statements before they had finished executing happened 28 times due to modification of a dependent object.

D. DML locks were requested 65,900 times for objects in the SQL AREA.

Answer(s): A,B

2. As a DBA, you notice a change in the performance of your database. Which two pieces of tuning-related information can you examine in the alert log to identify possible causes? (Choose two.)

A. the top five sessions that are consuming maximum resources

B. SQL statements that are consuming maximum resources

C. the number of block corruption errors

D. the instance parameter values that have been changed using ALTER SYSTEM since the last baseline

Answer(s): C,D

3. View the Exhibit and examine the Instance Efficiency Percentages that you got on generating an Automatic Workload Repository (AWR) report for your online transaction processing (OLTP) database. What can you deduce from this part of the AWR report? (Choose all that apply.)

A. A low Execute toParse % indicates that most SQL statements are reusing the existing execution plans.

B. A low Library Hit % indicates that cursors are not being reused.

C. A high In-memory Sort % indicates that most sorts are being done in memory, thereby causing the performance to degrade.

D. A high Buffer Hit % indicates that required data blocks were found in the Buffer Cache memory, thereby avoiding expensive disk I/O.

Answer(s): B,D

4. As a DBA configuring a new instance, you want to run a representative workload on the instance and examine the relevant statistics to see whether the cache is underconfigured or overconfigured. Given below is a list of the initialization parameters that would affect the statistics collection and advisories.

A. 2, 3, and 4

B. 2 and 3

C. only 2

D. 1, 3, and 4

Answer(s): C

5. You are a DBA in ABC Corp. You are working on a DSS system.. The applications directly connect to the database to perform transactions. The application users also perform direct loads. The company wants to upgrade from Oracle Database 10g version 10.2.0.1 to Oracle Database 11g. You want to test the performance of the SQL statements in the new environment before upgrading the production database. To accomplish this, you set up the test database with Oracle Database 11g, with the same data and schemas as in production. What would you recommend to accomplish the task?

A. configuring AWR to capture the maximum number of SQL statements, transporting it to the test system, and using SQL Access Advisor for performance analysis

B. creating a SQL Tuning Set by capturing the SQL workload on the production database and using SQL Performance Analyzer for performance analysis

C. gathering all the SQL statements and using SQL Tuning Advisor on the test database for performance analysis

D. capturing the workload on the production database, replaying it on the test machine, and comparing the performance

Answer(s): B

6. Examine the output of the query given below:

A. The GETS column shows the number of times a mutex/location was requested by the requesting session while being held by the blocking session.

B. The Cursor Stat and Cursor Pin SLEEPS indicate that the CURSOR_SHARING parameter is set to EXACT.

C. The sum of numbers in the GETS and SLEEPS columns indicates the number of times a mutex/location was requested by the requesting session while being held by the blocking session.

D. Each row in the output represents a SQL statement that had to wait for mutexes.

Answer(s): A

7. View the Exhibit. Examine the query on the v\$servicemetric view and the output. You wish to

A. DBTIMEPERSEC

B. DBTIMEPERCALL

C. DELTA

D. CALLSPERSEC

E. CPUPERCALL

Answer(s): B

8. View the Exhibit and examine the partial output obtained when you issued the following query:
SQL> SELECT name,class,value FROM v\$sysstat ORDER BY class;Which two interpretations are correct about the information obtained from this view? (Choose two.)

A. db block changes indicates the number of data blocks that have been changed.

B. redo log spacerequests indicates the number of times a there were waits for disk space to be allocated for the redo log entries.

C. Usage of CACHE and NOCACHE hints affects statistics for table scans (long tables) and table scans (short tables).

D. buffer is pinned count indicates the number of buffers that are currently pinned in the database instance.

Answer(s): B,C

9. View the Exhibit and note the workload type selected to quickly configure the metric threshold. Which statement describes the result after finishing this quick configuration process?

A. It uses only the SYSTEM_MOVING_WINDOW baseline for thresholds.

B. The thresholds set by the quick configuration process are of the Fixed Value type.

C. It sets thresholds for all basic metrics.

D. All thresholds set are of the Significance Level type.

Answer(s): A

10. There are 500 users of an online transaction processing (OLTP) application that resides in your database. The system had been maintaining an average response rate of 10 seconds as specified by the Service-Level Agreement (SLA).This morning you were informed that for the past four days

A. Determine whether new tablespaces have been created on the disks that are being used by the existing tablespaces.

B. Determine whether it is a memory configuration issue.

C. Determine whether the slow response is wait bound or CPU bound.

D. Determine whether the application is performing excessive I/O due to poor access path choice.

Answer(s): C

11. You are managing an online transaction processing (OLTP) database with multiple applications. The applications support a large number of users and most of the applications execute groups of SQL that run together. Which option would you use to monitor the performance issues for users of these applications?

A. Configure application users as part of the resource consumer group and monitor the resource usage statistics for the resource consumer group.

B. Monitor statistics and wait events collected for a MODULE and ACTION by performing service aggregation.

C. Monitor statistics for individual sessions in an application by querying V\$SESSION.

D. Specify service-level thresholds and priorities for users of applications and monitor the alerts.

Answer(s): B

12. You observed very low cache-hit ratio in your database as shown below:

A. The buffer cache size can be set to more than 16 MB to get more benefit.

B. The buffer cache size can be set to 12 MB for optimal performance.

C. The buffer cache size can be set to more than 16 MB but there would be no benefit from it.

D. The buffer cache size cannot be set to more than 16 MB because the SGA_MAX_SIZE value does not allow that.

Answer(s): A

13. Identify the situation in which you would use the Automatic Workload Repository (AWR) baseline template.

A. when resetting the threshold values for the SYSTEM_MOVING_WINDOW baseline based on a repeating time schedule in the future

B. when creating AWR snapshots based on a repeating time schedule

C. when computing statistics for all moving window baselines based on a repeating time schedule in the future

D. when creating and dropping AWR baselines based on a repeating time schedule

Answer(s): D

14. You want information in the form of charts for throughput and services that shows baseline values and thresholds for the baseline. How would you achieve this?

A. By adding a baseline template to the performance page in Oracle Enterprise Manager

B. By quickly configuring the metric threshold

C. By computing statistics for the desired baseline

D. By adding a baseline to the performance page in Oracle Enterprise Manager

Answer(s): D

15. You are a DBA in ABC Corp. You are working on an online transaction processing (OLTP)

A. Set up all the replay clients on the same machine on which the test database is running.

B. Preprocess the captured workload for the specified target database version.

C. Resolve all external references such as database links, external tables, and directory objects.

D. Set up as many replay clients as there are actual clients to the production system.

E. Restore the replay database to match the capture database at the start of the workload capture.

Answer(s): B,C,E

16. During a proactive database performance monitoring routine, on examining the AWR report you find that log file sync appears among the top 5 wait events. What does this event indicate?

A. Frequent commits or rollbacks are taking place in the application.

B. Frequent incremental checkpoints are taking place in the database.

C. Redo is generated faster than LGWR can write it out.

D. Frequent logfile switches are occurring.

Answer(s): A

17. Examine the output of the following query:

A. Automatic Memory Management is not enabled because the IMMEDIATE_GETS and IMMEDIATE_MISSES columns have zero in them.

B. The shared pool operations to allocate and free memory in it caused the misses.

C. The latch was requested in no wait mode.

D. The latch was requested in willing-to-wait mode.

Answer(s): B,D

18. You work for a company as a DBA. The company has an application to manage the details of its business and customer base. However, application users complain that updating the SALES record takes more time than it used to earlier. On investigation, you notice that the application performance degrades when a call is made to the UPDATE_INV procedure. Further, you execute the following query to investigate: SQL> SELECT name, type, sharable_mem, kept 2 FROM v\$db_object_cache 3 WHERE sharable_mem > 4000 4 AND EXECUTIONS > 5 5 AND (type='FUNCTION' OR type='PROCEDURE') 6 / NAME TYPE SHARABLE_MEM KEPT

- A. Increase the size of the keep buffer pool to accommodate the UPDATE_INV procedure.
- B. Enable the result cache if not already enabled.
- C. Keep the UPDATE_INV procedure by using the DBMS_SHARED_POOL.KEEP procedure.
- D. Flush the shared pool to make space for this procedure.
- E. Ask the developers to modify and use literals instead of bind variables in the UPDATE_INV procedure.

Answer(s): C

19. View the Exhibit exhibit1 to examine the series of SQL commands and parameter settings.

- A. the second plan, because it is the latest generated plan in FIRST_ROW mode
- B. the first plan, because it is an accepted plan
- C. the second plan, because it is a fixed plan
- D. A new plan, because the second plan in FIRST_ROW mode is not an accepted plan

Answer(s): B

20. In your organization the Oracle Database 11g installation includes the Oracle Diagnostic Pack. In your database, the STATISTICS_LEVEL and CONTROL_MANAGEMENT_PACK_ACCESS parameters, and the snapshot interval and retention period have been set to default values. Two users of your database have complained that a particular job or session is very slow for a transient interval of about 10 minutes during the

day when the rest of the instance is performing as usual. Where would you begin the investigation of this performance issue?

A. ADDM

B. ASH

C. Load Profile in an AWR Compare Period report

D. Alert log

Answer(s): B
