Distribution of Parameters for Generated SQL Queries on the TPC-H Database

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## Scenario: 1-6jp_ujjp__g_hOss_hOnss

## Scale factor: 0.01 GB

## The 1000-query pack was generated on: 2023-11-10

## First column ('Query parameter or value') displays either:

## - a parameter name, or

## - a value of the current parameter (only for low-cardinality parameters).

## Second column ('Descriptive statistics') displays:

## - for low cardinality parameters: frequency and proportion from total (of 1000 queries)

## - for higher cardinality parameters: [min, median, max] mean / SD
```

Query parameter or value	Descriptive statistics
SELECT_n_of_columns	[1, 8, 163] 16 / 24
SELECT_n_of_non_aggr_funcSUBSTR	
0	617~(62%)
1	262~(26%)
10	1 (0.1%)
2	73~(7.3%)
3	$20\ (2.0\%)$
4	10 (1.0%)
5	9 (0.9%)
6	4 (0.4%)
γ	4 (0.4%)
SELECT_n_of_non_aggr_funcLTRIM	[0.00, 0.00, 10.00] 0.55 / 0.99
SELECT_n_of_non_aggr_funcUPPER	
0	650~(65%)
1	242 (24%)

Query parameter or value	Descriptive statistics
2	61 (6.1%)
3	$22\;(2.2\%)$
4	7(0.7%)
5	10 (1.0%)
6	5 (0.5%)
7	$3\;(0.3\%)$
SELECT_n_of_non_aggr_funcROUND	,
0	$925 \; (93\%)$
1	61 (6.1%)
2	11 (1.1%)
3	$3\;(0.3\%)$
SELECT_n_of_non_aggr_funcRTRIM	[0.00, 0.00, 11.00] 0.62 / 1.16
SELECT_n_of_non_aggr_funcSQRT	
0	794~(79%)
1	159~(16%)
10	1 (0.1%)
2	18 (1.8%)
3	$13 \ (1.3\%)$
4	7~(0.7%)
5	3~(0.3%)
6	5~(0.5%)
SELECT_n_of_non_aggr_funcLOWER	
0	635~(64%)
1	244~(24%)
2	80 (8.0%)
3	$16 \ (1.6\%)$
4	$14 \ (1.4\%)$
5	4~(0.4%)
6	4 (0.4%)
γ	1 (0.1%)
8	2~(0.2%)
SELECT_n_of_non_aggr_funcDAY	
0	$886 \ (89\%)$
1	76~(7.6%)
2	$21\ (2.1\%)$
3	11 (1.1%)
4	5~(0.5%)
5	1~(0.1%)
SELECT_n_of_non_aggr_funcDOW	
0	848 (85%)
1	103 (10%)
2	26 (2.6%)
3	$12 \ (1.2\%)$
4	5~(0.5%)
5	5~(0.5%)
6	1 (0.1%)

SELECT_n_of_non_aggr_funcMONTH 0	
0	
	801 (80%)
1	136 (14%)
2	$22\ (2.2\%)$
3	18 (1.8%)
4	8 (0.8%)
5	8 (0.8%)
6	2~(0.2%)
7	4~(0.4%)
9	1 (0.1%)
SELECT_n_of_non_aggr_funcYEAR	,
0	829 (83%)
1	118 (12%)
2	$27 \ (2.7\%)$
3	10 (1.0%)
4	5 (0.5%)
5	5(0.5%)
6	2(0.2%)
7	3(0.3%)
8	1 (0.1%)
SELECT_n_of_non_aggr_funcTRUNC	,
0	915 (92%)
1	74 (7.4%)
2	9 (0.9%)
3	1 (0.1%)
4	1 (0.1%)
SELECT_n_of_non_aggr_funcLOG	,
0	872 (87%)
1	92 (9.2%)
2	19(1.9%)
3	8 (0.8%)
4	5(0.5%)
5	2(0.2%)
6	2(0.2%)
SELECT_n_of_non_aggr_funcFLOOR	,
0	928 (93%)
1	57 (5.7%)
2	10 (1.0%)
3	3 (0.3%)
4	2(0.2%)
SELECT_n_of_non_aggr_funcABS	` ,
0	914 (91%)
1	$73\ (7.3\%)$
	11 (1.1%)
2	11 (1.1/0)
2 3	$\frac{11}{2} \frac{(1.1\%)}{(0.2\%)}$

Query parameter or value	Descriptive statistics
SELECT_n_of_aggr_funcCOUNT	[0.00, 0.00, 13.00] 0.82 / 1.88
SELECT_n_of_aggr_funcMAX	$[0.00, 0.00, 13.00] \ 0.95 \ / \ 2.14$
SELECT_n_of_aggr_funcCOUNT_DISTINCT	$[0.00, 0.00, 11.00] \ 0.87 \ / \ 1.87$
SELECT_n_of_aggr_funcSUM	
0	922 (92%)
1	51 (5.1%)
2	$21\ (2.1\%)$
3	5 (0.5%)
4	1(0.1%)
SELECT_n_of_aggr_funcMIN	$[0.00, 0.00, 12.00] \ 0.79 \ / \ 1.88$
SELECT_n_of_aggr_funcAVG	
0	942~(94%)
1	$39\ (3.9\%)$
2	$12\;(1.2\%)$
3	$6~(0.6\%)^{'}$
4	1(0.1%)
SELECT_n_of_all_aggr_func	[0.00, 3.00, 15.00] 3.63 / 3.11
FROM_n_of_join_paths	[5:55, 5:55, 25:55] 5:55 / 5:22
1	168 (17%)
2	162 (16%)
3	171 (17%)
4	161 (16%)
5	172 (17%)
6	166 (17%)
FROM_n_of_super_joinsLEFT	(, •)
0	543 (54%)
1	298 (30%)
2	133 (13%)
3	$23 \ (2.3\%)$
4	3 (0.3%)
FROM_n_of_super_joinsRIGHT	- (, 0)
0	529 (53%)
1	329 (33%)
2	110 (11%)
3	31 (3.1%)
4	1 (0.1%)
FROM_n_of_super_joinsFULL	= (070)
0	546 (55%)
1	316 (32%)
2	112 (11%)
3	22 (2.2%)
4	4(0.4%)
FROM_n_of_joinsINNER	[0.00, 3.00, 11.00] 3.21 / 2.37
FROM_n_of_joinsRIGHT	[0.00, 3.00, 11.00] 3.30 / 2.45
FROM_n_of_processed_rows	[5, 94,765, 441,850] 119,861 / 94,470
WHERE_n_of_predicates	[0.00, 3.50, 12.00] $[0.95 / 2.99]$
MITTIET II OI PICUICAICS	[0.00, 0.00, 12.00] 0.00 / 2.00

Query parameter or value	Descriptive statistics
WHERE_n_of_attribs_of_typecharacter_varying	
0	357 (36%)
1	275 (28%)
2	182 (18%)
3	106 (11%)
4	59 (5.9%)
5	13(1.3%)
6	8 (0.8%)
WHERE_n_of_attribs_of_typeinteger	
0	381 (38%)
1	$265\ (27\%)$
2	195 (20%)
3	104 (10%)
4	45 (4.5%)
5	8 (0.8%)
6	$2\ (0.2\%)$
WHERE_n_of_attribs_of_typecharacter	
0	650~(65%)
1	$252\ (25\%)$
2	77 (7.7%)
3	17 (1.7%)
4	4~(0.4%)
$WHERE_n_of_attribs_of_type__numeric$	
0	546~(55%)
1	277~(28%)
2	122~(12%)
3	39 (3.9%)
4	15 (1.5%)
6	1 (0.1%)
WHERE_n_of_attribs_of_typedate	
θ	782 (78%)
1	174~(17%)
2	35~(3.5%)
3	9~(0.9%)
WHERE_n_of_pkey_attribs	
0	551 (55%)
1	281~(28%)
2	133 (13%)
3	32 (3.2%)
4	2 (0.2%)
5	1 (0.1%)
WHERE_n_of_connect_OR	[0.00, 2.00, 11.00] 2.29 / 2.41
WHERE_n_of_operatorsbetween	
0	509 (51%)
1	307 (31%)
2	125~(13%)

Query parameter or value	Descriptive statistics
3	47 (4.7%)
4	$12\;(1.2\%)$
WHERE_n_of_operatorsgreater_or_less	,
0	321 (32%)
1	263~(26%)
2	183~(18%)
3	$116 \ (12\%)$
4	70~(7.0%)
5	28~(2.8%)
6	$14 \ (1.4\%)$
γ	5~(0.5%)
WHERE_n_of_operatorsin	
θ	539~(54%)
1	275 (28%)
2	$123\ (12\%)$
3	$46 \; (4.6\%)$
4	$14\ (1.4\%)$
5	2~(0.2%)
6	1~(0.1%)
WHERE_n_of_operatorslike	((
0	788 (79%)
1	186 (19%)
2	21 (2.1%)
3	5 (0.5%)
WHERE_n_of_non_aggr_funcABS	27.1 (27.77)
0	954 (95%)
1	$46 \; (4.6\%)$
WHERE_n_of_non_aggr_funcMONTH	050 (0607)
0	958 (96%)
1	41 (4.1%)
WHERE is of non-agent time. FLOOR	1 (0.1%)
WHERE_n_of_non_aggr_funcFLOOR	957 (96%)
1	42 (4.2%)
2	1 (0.1%)
WHERE_n_of_non_aggr_funcROUND	1 (0.170)
0	946 (95%)
1	52 (5.2%)
2	2(0.2%)
WHERE_n_of_non_aggr_funcLOG	2 (0.270)
0	917 (92%)
1	81 (8.1%)
2	2(0.2%)
WHERE_n_of_non_aggr_funcDAY	2 (0.270)
0	969 (97%)
1	30 (3.0%)
-	00 (0.070)

Query parameter or value	Descriptive statistics
2	1 (0.1%)
WHERE_n_of_non_aggr_funcYEAR	(- / ")
0 = 0	963~(96%)
1	$33\ (3.3\%)$
2	4 (0.4%)
WHERE_n_of_non_aggr_funcSQRT	
θ	887 (89%)
1	99~(9.9%)
2	13~(1.3%)
3	1~(0.1%)
WHERE_n_of_non_aggr_funcTRUNC	
0	955~(96%)
1	42 (4.2%)
2	3~(0.3%)
WHERE_n_of_non_aggr_funcDOW	
0	968 (97%)
1	30 (3.0%)
NATION C. II.	2~(0.2%)
WHERE_n_of_all_non_aggr_func	617 (6907)
0	$617 (62\%) \\ 255 (26\%)$
1 2	91 (9.1%)
3	29 (2.9%)
4	7(0.7%)
5	1 (0.1%)
GROUP_BY_n_of_columns	[0.00, 2.00, 13.00] 2.99 / 2.75
HAVING_n_of_main_predicates	[0.00, 2.00, 10.00] 2.00 / 2.10
0	431~(43%)
1	207 (21%)
2	183 (18%)
3	179 (18%)
ORDER_BY_n_of_columns	,
0	275 (28%)
1	352~(35%)
2	248~(25%)
3	95~(9.5%)
4	15~(1.5%)
5	6~(0.6%)
6	5~(0.5%)
7	$3\ (0.3\%)$
8	1 (0.1%)
limit	[1, 504, 998] 501 / 291
offset	[0, 39, 998] 257 / 323