

G

1

2

3

4

J

18	1	10 - 9	12 - 11	9 - 8	10 - 9
	2	12 - 10	12 - 13 - 2.	9 - 8 + 1	12 - 13 - 2.
	3	9 - (3 + 3)	12 - 11 + 2.	12 - 13 - 1	10 - 9 + 2.
	4	10 - 9 + 3.	11 + 2 - 9	(9 - 8) + (4 - 1)	9 - 5
19	1	7 - 6	12 - 11	12 - 11	8 - 6
	2	7 - 3	4 - 6 / 3	8 - 6	12 - 10
	3	6 / 3 + 1	4 - 3 + 6 / 3	4 - (12 - 11)	12 - 10 + (3 - 2)
	4	3 + 1	7 - 3	6 / 3 + 8 / 4	6 / 3 + (7 - 5)
20	1	(12 / 3 + 5) - (5 + 3)	12 - 11	12 - 11	5 - (12 / 3)
	2	12 - 10	3 - (12 - 11)	3 - (12 - 11)	12 - 10
	3	(12 / 3 + 5) / 3.	4 - (12 - 11)	4 - (12 - 11)	5 - (12 / 3) + (12 - 10)
	4	(12 - 5) - 3	12 / 3 + 4	12 / 3 + 4	(12 - 10) + 10 / 5
21	1	6 - 5	12 - 11	12 - 11	6 - 5
	2	12 - 10	(12 - 10) + (7 - 6)	6 - 4	12 - 10
	3	5 - 6 / 3	7 - 6 + 2.	6 / 3 + 1	6 / 3 + (6 - 5)
	4	10 - 6	6 - 2.	12 / 4 + 1	(6 - 5) + 3.
22	1	6 / 3 - 1	12 - 11	7 - 2 - 11	(10 - 7) - 6 / 3.
	2	12 - 10	6 / 3	8 - 6	12 - 10
	3	6 / 3 + 1	6 - 3	(12 - 11) + (8 - 6)	((10 - 7) - 6 / 3) + (12 - 10)
	4	8 - 3 - 1	(4 - 3) + 3.	(11 - 9) + 6 / 3.	7 - 3
23	1	8 - (10 - 3)	7 - 6	8 - 6 - 1	7 - 6
	2	6 / 3 - (10 - 8)	11 - 6 - 3	3 - 1	5 - 3
	3	6 - (8 - 3) + (10 - 8)	(11 - 7) - (7 - 6)	8 - 6 + 1	6 - (5 - 2)
	4	10 - 6	(11 - 6) - (7 - 6)	(8 - 6) + (11 - 3 - 6)	10 - 6
24	1	10 - 9	12 - 11	12 - 11	7 - 6
	2	12 - 10	9 - 7	8 - 6	12 - 10
	3	6 / 3 + (5 - 3)	6 / 2	6 / 3 + 1	(9 - 7) + (3 - 2)
	4	6 / 3 + 10 / 5	11 - 9 + 2.	12 - 8	6 / 3 + 10 / 5
25	1	10 - 9	7 - 6	9 - 8	10 - 9
	2	8 - 6	11 - 9	11 - 9	9 - 7
	3	9 / 3	(9 - 7) + (7 - 6)	6 - 4 + 1	3 + (10 - 9)
	4	3 + 1	(9 - 7) + (11 - 9)	(11 - 9) + (8 - 6)	9 - 5
26	1	9 - 8	12 - 11	12 - 11	10 - (6 / 3 + 2)
	2	12 - 10	9 - 7	8 - 6 / 3.	12 - 10
	3	6 / 3 + 1	6 / 3 + (12 - 11)	6 / 3 + 1	5 - 6 / 3.
	4	3 + 1	6 / 3 + (9 - 7).	12 - 8	9 - 5
27	1	9 - 8	12 - 11	12 - 11	6 - 5
	2	12 - 10	9 - 7.	6 - 4	12 - 10
	3	(12 - 10) + (9 - 8)	(12 - 11) + 2.	(12 - 11) + (6 / 3)	12 - (7 + 2)
	4	9 - 5	6 / 3 + 2.	6 / 3 + 6 - 4.	6 / 3 + (7 - 5)
28	1	9 - 8	12 - 11	12 - 11	6 - 5
	2	12 - 10	9 - 7	6 - 4	12 - 10
	3	5 - 3 + 1	6 - 4 + (3 - 2)	4 - (10 - 8)	12 - (7 + 2)
	4	7 - 2 - 8	(9 - 7) + (6 - 4)	12 - 8	6 / 3 + (7 - 5)

Reiss. 1-4

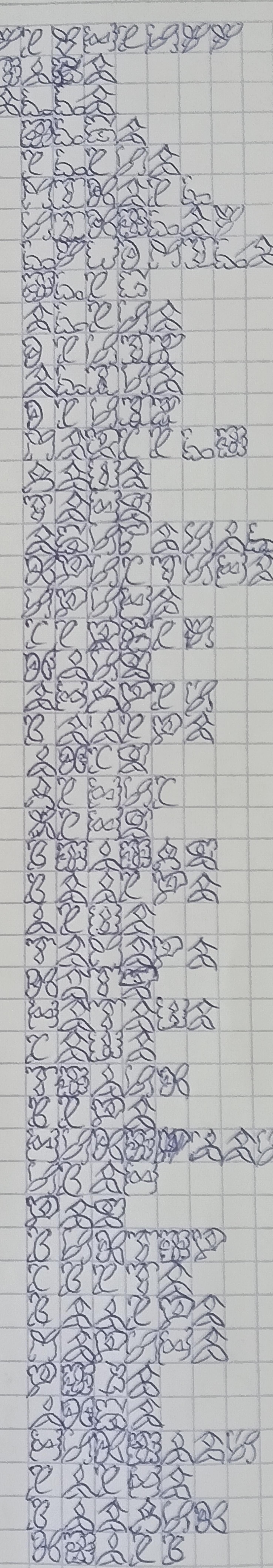
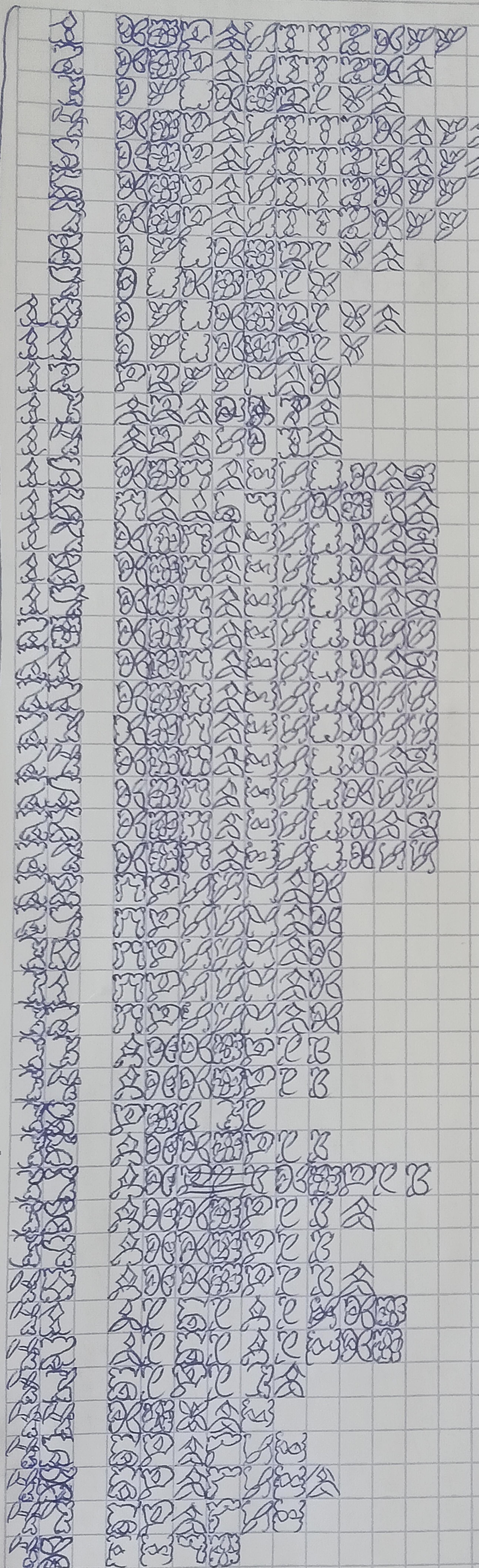
компонент 1/4 2 співочний

1	1	$1 + (6+3) + 1$	3 - 6	$8 + 4 + 10$	10 - 9	Spana	70 1150
2	2	$3 - 5 - 3$	6 - 4	3 - 1	12 - 10		12 207.
3	3	$6/3 + 1$	$9 - (4 + 2)$	$6/3 + 1$	$10 - 9 + 2$		
4	4	3 + 1	$6/3 + 2$	$12 - 9 + 1$	$6/3 + 2$		
1	1	$6/3 - 1$	3 - 2	$6 - 4 - 1$	3 - 1		
2	2	5 - 3	$6/2 - 8 + 6 - 10$	8 - 6	$6/2 - (3 - 1)$		
3	3	$8 - 6 + 1$	6/2	$11 - (6 + 3) + 1$	$6/2$		
4	4	$(8 - 6) + (5 - 3)$	6 - 2	$(8 - 6) + (3 - 1)$	6 - 2		
1	1	$(8 + 3) - (5 + 3) (6 - 3)$	4 - 3	4 - 3	$(7 - 3) - (10 - 4)$		
2	2	$5 - 3$	$4 - 3$	$4 - 3 + 1$	$4 - 3 (10 - 8) (3 - (10 - 8))$		
3	3	$(8 + 3) - (5 + 3) (7 - 3) (4 - 3) (4 - 3) + (3 - 1)$	$(4 - 3) + (3 - 1)$	$(4 - 3) - (1 - 3) = (10 - 3)$			
4	4	$(5 - 3) + (5 - 3)$	4 - 3	3 + 1	4 - 3		
1	1	$8 + 5 - 3 - 1$	4 - 3	4 - 3	3 - 2		
2	2	5 - 3	$(12/4) - (4 - 3)$	$(12/4) - (4 - 3)$	$12/3 - 2$		
3	3	5 - 3 + 1	12/4	12/4	$12 - 3 - 2$		
4	4	3 + 1	$(12/4) - (4 - 3)$	12/3	5 - 3 + 2		
1	1	6 - 5	12 - 11	4 - (12 - 9)	$6/18 - 5$		
2	2	5 - 3	$4 - (6 - 3)$	12 - 9 - 1	$5 - (12 - 9)$		
3	3	$5 - (6/3)$	$12 - 8 + 6/3$	$12 - 8 + 6/3 + 1$	$5 - (6/3)$		
4	4	9 - 5	$6/3 + 2$	12 - 9 + 1	9 - 5		
1	1	6 - 5	$6/2 - (6 - 4)$	$6 - (1 + 4)$	3 - 6		
2	2	6 - 5 + 1	6 - 4	6 - 4	$10 - 6 - 2$		
3	3	$6 - (5 - 1) + 1$	6/2	$6 - (11 - 1)$	$6 - 5 + 2$		
4	4	$5 - (6 - 5)$	6 - 2	$11 - (6 + 1)$	$10 - 6$		
1	1	10 - 9	7 - 6	9 - 8	3 - 6		
2	2	8 - 6	9 - 7	3 - 1	9 - 7		
3	3	$5 - (6/3)$	$7 - 6 + (9 - 5)$	6/3 + 1	$(7 - 3) - (7 - 6)$		
4	4	9 - 5	$9 - 5 + (6/3)$	$12 + 9 + 1$	7 - 3		
1	1	$6 - (8 - 3)$	12 - 11	$6 - (8 - 3)$	3 - 2		
2	2	8 - 6	$4 - (6/3)$	8 - 6	$12 - 10$		
3	3	$6 - (8 - 3) + (8 - 6)$	$4 - (12 - 11)$	$6 - (8 - 3) + (8 - 6)$	$(12 - 10) + (3 - 2)$		
4	4	12 - 8	$6 - 4 + 6/3$	12 - 8	$10 - 6$		
1	1	9 - 8	$(3 - 2) - 2 - (9 - 7)$	9 - 8	$(9 + 2) - 8 - 2 - (9 - 7)$		
2	2	$9 + 1 - 8$	9 - 7	$9 - (8 - 1)$	9 - 7		
3	3	$9 + 1 - 8 + (9 - 8)$	$(7 - 2) - 2$	$9 - (8 - 1) + (9 - 8)$	$(9 + 2) - 8 - 2$		
4	4	$(9 + 1 - 8) + (9 + 18)$	$(9 - 7) + 2$	$9 - (8 - 1) + (9 - 8 - 11)$	$9 - 7 + 2$		
1	1	10 - 3 - 6	12 - 11	12 - 11	$10 - 3 - 6$		
2	2	12 - 10	6 - 4	3 - 1	$12 - 10$		
3	3	$10 - 6 - 10 - 3 - 6$	$12 - 11 + 6/3$	6/3 + 1	$10 - 3 - 6 + (12 - 10)$		
4	4	10 - 6	6 - 2	3 + 1	$10 - 6$		
1	1	10 - 9	$9 - 3 + 6 - 11$	$9 - 3 + 6 - 11$	$10 - 9$		
2	2	3 - 1	11 - 9	11 - 9	6 - 5		
3	3	$6/3 + 1$	$11 - 9 - (9 - 3 + 6 - 11)$	$(11 - 9) - (9 - 3 + 6 + 11)$	$6 - (5 - 2)$		
4	4	$8/3 + 1$	$(11 - 9) + (11 - 9)$	$(11 - 9) - (11 - 9)$	$6 - 2$		
1	1	$12 - (10 + 1)$	12 - 11	12 - 11	$12/2 - (10/2)$		
2	2	12 - 10	$11 + 2 - 12 + 2$	$12 - (11 - 1)$	$12 - 10$		
3	3	$12 - (8 - 1)$	$12 - (7 + 2)$	$12 - 11 + (12 - (11 - 1))$	$12/2 - (12 - 11)$		
4	4	12 - 8	$12 - 11 - (7 - 4)$	$(12 - (11 - 1)) + (12 - (11 - 1)) + 12 - (10 - 2)$			

$12 - 9 - (6/3) = 1$   
 $6/3 = 8 + 4 - 11 + 1$   
 $3 = 4 - 1$   
 $12/3 = 4$   
 $12 + 9 + (6/3) = 4 + 1$   
 $6 = 11 - 1 - 4$   
 $9 - (6/3) = 8 - 1$   
 $12 - 8 + (6/3) = 8$   
 $\cancel{12 - (6/3)} 9 = 8 + 1$   
 $12 - (6/3) = 11 - 1$   
 $9 + (6/3) = 11$   
 $12 = 11 + 1$   
 $(12/3) + 9 = 8 + 4 + 1$   
 $12 + (6/3) = 11 - 1 + (8 - 4)$   
 $12 + 3 = 11 + 4$   
 $12 + 6 - (6/3) = 11 + 4 + 1$   
 $12 + 3 + (6/3) = (11 - 8) + 4 + 11 + 1$   
 $6 * 3 = 11 + 8 - 1$   
 $12 + 9 - (6/3) = \cancel{(11 - 8) + 9} + 11 + 8 + 1$   
 $12 + (6/3) + 9 + 3 - (6/3) = 11 + 8 + 1$   
 $3 * 9 + 6 = 11 + 8 + (4 - 1) + 1$   
 $12 - (6/3) + 9 + 3 = 11 + 8 + 4 - 1$   
 $12 + 9 + (6/3) = 11 + 8 + (4 - 1)$   
 $12 + 9 + (6 - 3) = 11 + 8 + 4 + 1$   
 $12 - 9 - (6/3) = 10 - 7 - 2$   
 $6/3 = 2$   
 $3 = 10 - 7$   
 $12/3 = 7 - 5 + 2$   
 $12 - 9 + (6/3) = 5$   
 $6 = 10 - (7 - 5 + 2)$   
 $9 - (6/3) = 7$   
 $12 - 6 + (6/3) = 10 - 2$   
 $9 = 7 + 2$   
 $12 - (6/3) = 10$   
 $9 + (6/3) = 10 + (5 - 2 - (7 - 5))$   
 $12 = 10 + 2$   
 $(12/3) + 9 = 10 + 5 - 2$   
 $12 + (6/3) = 10 + 2 + (7 - 5)$   
 $12 + 3 = 10 + 5$   
 $12 + 6 - (6/3) = 10 + 5 + (5 - 2 - (7 - 5))$   
 $12 + 3 + (6/3) = 10 + 7$   
 $6 * 3 = 10 + 8 + (5 - 2 - (7 - 5))$   
 $12 + 9 - (6/3) = 10 + 7 + 2$   
 $12 + (6/3) + 9 + 3 - (6/3) = 10 + (7 - 2) + 5$   
 $3 * 9 + 6 = 10 + 7 + 5 - (5 - 2 - (7 - 5))$   
 $12 - (6/3) + 9 + 3 = 10 + 7 + 5$   
 $12 + 9 + (6/3) = 10 + 7 + 5 + (5 - 2 - (7 - 5))$   
 $12 + 9 + (6 - 3) = 10 + 7 + 5 + 2$

Баланс от 190 и сравнивай с инициалните операции

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$12 - 9 - (6/3)$	=	1	1;2
$6 / 3$	=	8-5-1	1;2
$3$	=	8-5	2
$12/3$	=	5-1	1
$12 - 9 + (6/3)$	=	5	1;2
$6$	=	5 + 1	1
$9 - (6/3)$	=	$10 - (8-5)$	1;2
$12 - 6 + (6/3)$	=	8	1;2
$9$	=	8 + 1	1
$12 - (6/3)$	=	10	1;2
$9 + (6/3)$	=	$10 + 1$	1;2
$12$	=	$10 + (8-5-1)$	2
$(2/3) + 9$	=	$10 + 3$	2
$12 + (6/3)$	=	$10 + (5-1)$	1;2
$12 + 3$	=	$10 + 5$	2
$12 + 6 - (6/3)$	=	$10 + 5 + 1$	1;2
$12 + 3 + (6/3)$	=	$10 + 8 - 1$	1;2
$6 \times 3$	=	$10 + 8$	1;2
$12 + 9 - (6/3)$	=	$10 + 8 + 1$	1;2
$12 + (6/3) + 9 + 3 - (6/3) + 0 + (8+5) - (8-3)$	=	$10 + (8+5) - (8-3) + 1$	1;2
$3 \times 9 - 6$	=	$10 + (8+5) - (8-3) + 1$	1;2
$12 - (6/3) + 9 + 3$	=	$10 + 8 + 5 - 1$	1;2
$12 + 9 + (6/3)$	=	$10 + 8 + 5$	1;2
$12 + 9 + (6-3)$	=	$10 + 8 + 5 + 1$	2;1
$12 + 9 - (6/3)$	=	$8-4-2$	1;2
$6/3$	=	2	2
$3$	=	$8-4$	3
$12/3$	=	4	2
$12 - 9 + (6/3)$	=	$11-4-2$	1;2
$6$	=	$4+2$	1;2
$9 - (6/3)$	=	7	1;1
$12 - 6 + (6/3)$	=	$11+8+4$	2
$9$	=	$7+2$	2
$12 - (6/3)$	=	$11-8+2$	1
$9 + (6/3)$	=	11	1;1
$12$	=	$11+(8-4-2)$	1
$12/3 + 9$	=	<del>8-4-1</del> $11+2$	1
$12 + (6/3)$	=	$11+8-4$	1
$12 + 3$	=	$11+4$	1
$12 + 6 - (6/3)$	=	$11+8-2$	1
$12 + 3 + (6/3)$	=	$11+4+6$	1
$6 \times 3$	=	$11+7$	1
$12 + 9 - (6/3)$	=	$11+8+4-(7-4)$	1
$12 + (6/3) + 9 + 3 - (6/3)$	=	$11+8-2$	1
$3 \times 9 - 6$	=	$11+8+(7-4)$	1
$12 - (6/3) + 9 + 3$	=	$11+8+4$	1
$12 + 9 + (6/3)$	=	$11+8+7-2$	1
$12 + 9 + (6-3)$	=	$11+8+4+2$	1

Keys. 1-4  $\oplus$  компонент 2 этап

	1	2	3	4
1	$19 + (6+3) + 1$	$2 - 6$	<del><math>8 + 4 + 1</math></del>	$10 - 9$
2	$3 - 5 - 3$	$6 - 4$	$3 - 1$	$12 - 10$
3	$6/3 + 1$	$9 - (4+2)$	$6/3 + 1$	$10 - 9 + 2$
4	$3 + 1$	$6/3 + 2$	$12 - 9 + 1$	$6/3 + 2$
2	$6/3 - 1$	$3 - 2$	$6 - 4 - 1$	$3 - 1$
2	$5 - 3$	$6/2$	$8 - 6$	$6/2 - (3 - 1)$
3	$8 - 6 + 1$	$6/2$	$11 - (6+3) + 1$	$6/2$
4	$(8-6) + (5-3)$	$6 - 2$	$(8-6) + (3-1)$	$6 - 2$
3	$(8+3) - (5+3) - (5-3)$	$4 - 3$	$4 - 3$	$(7-3) - (10-2)$
2	$5 - 3$	$4 - 3$	$4 - 3 + 1$	$(7-3) - (10-2) + (2-3 - (10-3))$
3	$(8+3) - (5+3)$	$(7-3) - (4-3)$	$(4-3) + (3-1)$	$(7-3) - (7-3) - (10-3)$
4	$(5-3) + (5-3)$	$7 - 3$	$3 + 1$	$7 - 3$
4	$8 + 5 - 3 - 1$	$4 - 3$	$4 - 3$	$3 - 2$
2	$5 - 3$	$(12/4) - (4-3)$	$(12/4) - (4-3)$	$12/3 - 2$
3	$5 - 3 + 1$	$12/4$	$12/4$	$12 - 2 - 2$
4	$3 + 1$	$(12/4) + (4-3)$	$12/3$	$5 - 3 + 2$
5	$6 - 5$	$12 - 11$	$4 - (12 - 9)$	$6/3 - 5$
2	$5 - 3$	$4 - (6 \div 3)$	$12 - 9 - 1$	$5 - (12 - 9)$
3	$5 - (6/3)$	$12 - 11$	$12 - 9 + 1$	$5 - (6/3)$
4	$9 - 5$	$6/3 + 2$	$12 - 9 + 1$	$9 - 5$
6	$6 - 5$	$6/2 - (6 - 4)$	$6 - (1 + 4)$	$8 - 6$
2	$6 - 5 + 1$	$6 - 4$	$6 - 4$	$10 - 6 - 2$
3	$6 - (5 - 1) + 1$	$6/2$	$6 - (4 - 1)$	$6 - 5 + 2$
4	$5 - (6 - 5)$	$6 - 2$	$11 - (6 + 1)$	$10 - 6$
7	$10 - 9$	$7 - 6$	$9 - 8$	$8 - 6$
2	$8 - 6$	$9 - 7$	$3 - 1$	$9 - 7$
3	$5 - (6/3)$	$7 - 6 + (9 - 8)$	$6/3 + 1$	$(7-3) - (7-6)$
4	$9 - 5$	$9 - 8 + (6/3)$	$12 + 9 + 1$	$7 - 3$
8	$6 - (8 - 3)$	$12 - 11$	$6 - (8 - 3)$	$3 - 2$
2	$8 - 6$	$4 - (6/2)$	$8 - 6$	$12 - 10$

		$6-5$	$6/2 - (6-4)$	$6-(1+4)$	$1-3$
7	1	$6-5+1$	$6-4$	$6-4$	$7-6$
	2	$6-(5-1)+1$	$6/2$	$6-(4-1)$	$10-6-2$
	3	$5-(6-5)$	$6-2$	$11-(6+1)$	$6-5+2$
	4	$10-9$	$7-6$	$9-8$	$10-6$
	1	$8-6$	$9-7$	$3-1$	$7-6$
	2	$5-(6/3)$	$(7-6)+(9-7)$	$6/3+1$	$9-7$
	3	$9-5$	$9-7+(6/3)$	$12+9+1$	$(7-3)-(7-6)$
8	1	$6-(8-3)$	$12-11$	$6-(8-3)$	$7-3$
	2	$8-6$	$4-(6/3)$	$8-6$	$3-2$
	3	$6-(8-3)+(8-6)$	$4-(12-11)$	$6-(8-3)+(8-6)$	$12-10$
	4	$12-8$	$6-4+6/3$	$12-8$	$(12-10)+(3-2)$
9	1	$9-8$	$(7-2)-2-(9-7)$	$9-8$	$10-6$
	2	$9+1-8$	$9-7$	$9-(8-1)$	$(9+2)-7-2)-(9-7)$
	3	$(9+1-8)+(9-8)$	$(7-2)-2$	$9-(8-1)+(9-8)$	$9-7$
	4	$(9+1-8)+(9+1-8)$	$(9-7)+2$	$9-(8-1)+(9-8-1)$	$9-7+2$
10	1	$10-3-6$	$12-11$	$12-11$	$10-3-6$
	2	$12-10$	$6-4$	$3-1$	$12-10$
	3	$(10-6)-(10-3-6)$	$12-11+6/3$	$6/3+1$	$(10-3-6)+(12-10)$
	4	$10-6$	$6-2$	$3+1$	$10-6$
11	1	$10-9$	$9-3+6-11$	$9-3+6-11$	$10-9$
	2	$3-1$	$11-9$	$11-9$	$6-5$
	3	$6/3+1$	$(11-9)-(9-3+6+1)$	$(11-9)-(9-3+6+11)$	$6-(5-2)$
	4	$8/3+1$	$(11-9)+(11-9)(11-9)-(11-9)$		$6-2$
12	1	$12-(10+1)$	$12-11$	$12-11$	$(12/2)-(10/2)$
	2	$12-10$	$11+2-12+2$	$12-(11-1)$	$12-10$
	3	$12-(8-1)$	$12-(7+2)$	$12-11+(12-(11-1))$	$(12/2)-(10/2)+(12-10)$
	4	$12-8$	$12-11-(7-4)$	$(12-(11-1)+(12-(11-1))$	$12-(10-2)$