

Quin Bros

HW 21

1)	n	$u(n)$	$M(n)$	2)	n	$P_1 + P_2$
	1	1	1		4	2+2
	2	-1	0		5	2+3
	3	-1	-1		6	3+3
	4	0	-1		7	2+5
	5	-1	-2		8	5+3
	6	1	-1		9	7+2
	7	-1	-2		10	7+3
	8	0	-2		11	11
	9	0	-2		12	7+5
	10	1	-1		13	11+2
	11	-1	-2		14	11+3
	12	0	-2		15	13+2
	13	-1	-3		16	13+3
	14	1	-2		17	17
	15	1	-1		18	18
	16	0	-1		19	17+2
	17	-1	-2		20	17+3
	18	0	-2		21	19+2
	19	-1	-3		22	19+3
	20	0	-3		23	23
					24	19+5
					25	23+2
					26	23+3
					27	27
					28	28+5
					29	27+2
					30	27+3

3) [(35), (5, 2), (11, 13), (17, 19), (29, 31)]

4) 2 → 1; 3 → 5 → 8 → 4 → 2 → 1; 4 → 2 → 1; 5 → 8 → 4 → 2 → 1;
 6 → 3 → 5 → 8 → 4 → 2 → 1; 7 → 11 → 17 → 26 → 13 → 20 → 10 → 5 → 8 → 4 → 2 → 1;
 8 → 4 → 2 → 1; 9 → 14 → 7 → 11 → 17 → 26 → 13 → 20 → 10 → 5 → 8 → 4 → 2 → 1;
 10 → 5 → 8 → 4 → 2 → 1; 11 → 17 → 26 → 13 → 20 → 10 → 5 → 8 → 4 → 2 → 1;
 12 → 6 → 3 → 5 → 8 → 4 → 2 → 1; 13 → 20 → 10 → 5 → 8 → 4 → 2 → 1;
 14 → 7 → 11 → 17 → 26 → 13 → 20 → 10 → 5 → 8 → 4 → 2 → 1;
 15 → 23 → 35 → 53 → 8 → 40 → 20 → 10 → 5 → 8 → 4 → 2 → 1;
 16 → 8 → 4 → 2 → 1; 17 → 26 → 13 → 20 → 10 → 5 → 8 → 4 → 2 → 1;
 18 → 9 → 14 → 7 → 11 → 17 → 26 → 13 → 20 → 10 → 5 → 8 → 4 → 2 → 1;
 19 → 29 → 44 → 22 → 11 → 17 → 26 → 13 → 20 → 10 → 5 → 8 → 4 → 2 → 1;