Table S1. **Cell karyotypes and modal chromosome numbers**

Cell line	Reported karyotype[a]	Measured karyotype[b]	Modal chromosome number[c]			
			2	7	8	15
Diploid						
RPE1	46	46	2	2	2	2
HCT116	45	45	2	2	2	2
Aneuploid						
HT29	71	66	3	3	1	3
Caco2	96	78	5	4	4	4
MCF-7	82	75	4	4	3	4

[a]http://www.atcc.org.
[b]Determined by counting at least 50 chromosome spreads per cell line.
[c]From at least 800 nuclei for each cell line using centromere-specific FISH.

Table S2. **Modal chromosome numbers in HCT116 cell clones (percentage of cells that deviate from mode)**

Cell line	Mode (% deviation)			
	Chromosome			
	2	7	8	15
Control (clone 1)	2 (2.3)	2 (4.5)	2 (4.8)	2 (6.2)
Control (clone 2)	2 (5.0)[a]	2 (5.6)[a]	2 (6.2)[a]	2 (5.9)
Control (clone 3)	2 (3.3)	2 (1.3)	2 (4.6)	2 (6.5)[a]
Monastrol 1 d (clone 4)	2 (3.6)	2 (4.0)	2 (3.0)	2 (6.0)
Monastrol 1 d (clone 5)	2 (2.6)	2 (4.2)	2 (5.8)	2 (4.0)
Monastrol 1 d (clone 6)	2 (5.3)	2 (3.3)	2 (8.2)	2 (5.9)
Monastrol 3 d (clone 7)	2 (7.6)	2 (4.4)	2 (5.1)	2 (16.6)[c]
Monastrol 3 d (clone 8)	2 (4.3)	2 (3.3)	2 (6.6)	2 (10.2)
Monastrol 3 d (clone 9)	2 (2.3)	2 (3.6)	2 (5.3)	2 (5.6)
Monastrol 5 d (clone 10)	2 (21.9)[c]	2 (5.6)	2 (28.2)[c]	2 (23.3)[c]
Monastrol 5 d (clone 11)	2 (16.5)[c]	2 (4.6)	2 (11.5)[c]	2 (17.2)[c]
Monastrol 5 d (clone 12)	2 (18.7)[c]	2 (3.6)	2 (25.2)[c]	2 (19.7)[c]
Monastrol 5 d (clone 13)	2 (14.4)[c]	2 (4.3)	2 (10.5)	2 (20.0)[c]
Monastrol 5 d (clone 14)	2 (6.0)	2 (7.3)	2 (5.3)	2 (5.6)
Monastrol 5 d (clone 15)	2 (10.9)[c]	2 (2.3)	2 (6.9)	2 (12.5)[c]
Monastrol 5 d (clone 16)	2 (6.1)	2 (2.5)	2 (4.4)	2 (12.3)[c]
Monastrol 7 d (clone 17)	2 (14.3)[c]	2 (5.2)	2 (7.2)	2 (19.5)[c]
Monastrol 7 d (clone 18)	2 (15.7)[c]	2 (2.3)	2 (5.0)	2 (17.0)[c]
Monastrol 7 d (clone 19)	2 (12.1)[c]	2 (5.9)	2 (10.9)[c]	2 (12.7)[c]
Monastrol 7 d (clone 20)	2 (10.9)[c]	2 (8.9)	2 (17.5)[c]	2 (16.2)[c]
Monastrol 7 d (clone 21)	2 (26.6)[c]	2 (18.8)[c]	2 (18.5)[c]	2 (15.3)[b,c]
Monastrol 7 d (clone 22)	4 (29.7)[c]	4 (26.2)[c]	4 (28.2)[c]	4 (32.3)[b,c]
Monastrol 7 d (clone 23)	2 (5.0)	2 (11.0)[c]	2 (10.4)	2 (8.9)
Monastrol 9 d (clone 24)	2 (5.9)	2 (9.5)	2 (12.5)[c]	2 (7.9)
Monastrol 9 d (clone 25)	2 (3.9)	2 (2.6)	2 (3.6)	2 (8.2)
Monastrol 9 d (clone 26)	2 (2.3)	2 (2.3)	2 (2.6)	2 (7.8)
Monastrol every third division (clone 27)	2 (11.8)[c]	2 (6.0)	2 (10.3)	2 (16.7)[c]
Monastrol every third division (clone 28)	2 (6.3)	2 (4.6)	2 (10.2)	2 (12.7)[c]
Monastrol every third division (clone 29)	2 (4.6)	2 (7.9)	2 (10.9)[c]	2 (13.5)[c]
Monastrol every third division (clone 30)	2 (5.3)	2 (6.5)	2 (9.7)	2 (12.3)[c]
Monastrol every third division (clone 31)	2 (6.6)	2 (11.6)[c]	2 (8.9)	2 (20.7)[c]
Nocodazole 1 d (clone 32)	2 (2.0)	2 (2.0)	2 (4.6)	2 (6.9)
Nocodazole 1 d (clone 33)	2 (6.5)	2 (4.7)	2 (4.7)	2 (7.8)
Nocodazole 1 d (clone 34)	2 (5.6)	2 (6.3)	2 (8.2)	2 (11.0)
Nocodazole 3 d (clone 35)	2 (2.9)	2 (2.3)	2 (9.9)	2 (7.5)
Nocodazole 3 d (clone 36)	2 (5.3)	2 (1.3)	3 (6.3)	2 (9.2)
Nocodazole 3 d (clone 37)	2 (14.7)[c]	2 (4.7)	2 (7.7)	2 (6.7)
Nocodazole 5 d (clone 38)	4 (7.3)	4 (7.9)	4 (9.6)	4 (9.4)[b]
Nocodazole 5 d (clone 39)	2 (7.0)	2 (2.6)	2 (4.0)	2 (4.5)
Nocodazole 5 d (clone 40)	2 (6.3)	2 (1.3)	2 (3.0)	2 (9.9)
Nocodazole 7 d (clone 41)	2 (5.4)	2 (4.3)	2 (6.2)	2 (11.5)[c]
Nocodazole 7 d (clone 42)	2 (6.6)	2 (6.6)	2 (9.3)	2 (6.3)
Nocodazole 7 d (clone 43)	2 (5.6)	2 (3.9)	2 (4.9)	2 (6.6)
Nocodazole 9 d (clone 44)	2 (4.6)	2 (3.6)	2 (3.9)	2 (5.6)
Nocodazole 9 d (clone 45)	2 (5.3)	2 (2.6)	2 (4.3)	2 (4.6)
Nocodazole 9 d (clone 46)	2 (4.3)	2 (2.7)	2 (3.3)	2 (7.2)
Nocodazole 15 d (clone 47)	2 (5.9)	2 (4.2)	2 (5.2)	2 (5.9)
Nocodazole 15 d (clone 48)	2 (15.0)[c]	2 (11.6)[c]	2 (11.6)[c]	2 (17.8)[c]
Nocodazole 15 d (clone 49)	2 (10.3)[c]	2 (6.8)	2 (7.1)	2 (17.0)[c]
Nocodazole 20 d (clone 50)	2 (4.9)	2 (5.5)	2 (4.5)	2 (9.2)
Nocodazole 20 d (clone 51)	2 (3.6)	2 (3.9)	2 (7.5)	2 (4.2)
Nocodazole 20 d (clone 52)	2 (4.2)	2 (2.0)	2 (3.9)	2 (5.5)

[a]Control cell clone used for statistical comparison for each chromosome.

[b]Clones contained significant fractions of tetraploid cells.

[c]$P < 0.05$, χ^2 test.

Table S3. **Modal chromosome numbers in RPE-1 cell clones (percentage of cells that deviate from mode)**

Cell line	Mode (% deviation)			
	Chromosome			
	2	7	8	15
Control (clone 1)	2 (2.9)[a]	2 (2.3)	2 (3.5)	2 (3.5)[a]
Control (clone 2)	2 (2.3)	2 (3.9)[a]	2 (3.9)[a]	2 (2.0)
Control (clone 3)	2 (1.3)	2 (1.6)	2 (3.9)	2 (3.3)
Monastrol 5 d (clone 4)	2 (3.0)	2 (2.0)	2 (5.6)	2 (4.3)
Monastrol 5 d (clone 5)	2 (6.0)	2 (2.6)	2 (5.6)	2 (5.0)
Monastrol 5 d (clone 6)	2 (3.3)	2 (3.9)	2 (4.5)	2 (6.9)
Monastrol 15 d (clone 7)	2 (4.0)	2 (2.6)	2 (2.6)	2 (3.7)
Monastrol 15 d (clone 8)	2 (4.9)	2 (2.9)	2 (9.1)[b]	2 (7.2)[b]
Monastrol 15 d (clone 9)	2 (4.3)	2 (2.3)	2 (4.3)	2 (2.0)
Monastrol 25 d (clone 10)	2 (3.0)	2 (4.3)	2 (11.3)[b]	2 (4.6)
Monastrol 25 d (clone 11)	2 (5.2)	2 (4.9)	2 (8.9)[b]	2 (5.8)
Monastrol 25 d (clone 12)	2 (5.0)	2 (6.0)	2 (7.4)	2 (5.0)
Nocodazole 5 d (clone 13)	2 (2.6)	2 (1.6)	2 (5.9)	2 (3.3)
Nocodazole 5 d (clone 14)	2 (3.3)	2 (3.0)	2 (5.2)	2 (6.0)
Nocodazole 5 d (clone 15)	2 (4.8)	2 (2.3)	2 (5.2)	2 (6.9)
Nocodazole 15 d (clone 16)	2 (6.6)	2 (3.9)	2 (6.9)	2 (10.2)[b]
Nocodazole 15 d (clone 17)	2 (2.0)	2 (3.0)	3 (5.0)	2 (7.6)[b]
Nocodazole 15 d (clone 18)	2 (2.6)	2 (2.7)	2 (4.3)	2 (3.9)
Nocodazole 25 d (clone 19)	2 (2.6)	2 (3.2)	2 (7.8)[b]	2 (6.9)
Nocodazole 25 d (clone 20)	2 (2.3)	2 (2.3)	2 (6.3)	2 (4.0)
Nocodazole 25 d (clone 21)	2 (2.0)	2 (3.9)	2 (5.5)	2 (4.2)

[a]Control cell used for statistical comparison for each chromosome.
[b]$P < 0.05$, χ^2 test.

Table S4. **Modal chromosome numbers in aneuploid cell clones (percentage of cells that deviate from mode)**

Cell line	Mode (% deviation)			
	Chromosome			
	2	7	8	15
HT29 (clone 1)	3 (6.1)	3 (20.1)	1 (2.6)	3 (36.2)
HT29 (clone 2)	3 (11.8)	3 (9.8)	1 (3.3)	3 (39.7)
Caco2 (clone 1)	5 (25.2)	4 (26.7)	4 (21.6)	4 (27.5)
Caco2 (clone 2)	5 (18.0)	4 (14.8)	4 (18.0)	4 (32.7)
MCF-7 (clone 1)	4 (20.4)	4 (15.7)	3 (13.8)	4 (32.4)
MCF-7 (clone 2)	4 (13.5)	4 (16.9)	3 (10.7)	4 (41.8)