Fill in the Blanks — Hooke's Law

A horizontal elastic string or spring is fixed at one end. Its initial length is its natural length l. A force is applied to extend or compress the string or spring.

Modulus of Elasticity	Natural Length	Extension or Compression		Final Length	Tension
30 N	1 m	Extension	0.2 m	1.2 m	6 N
20 N	2 m	Extension	0.5 m	2.5 m	5 N
24 N	1.5 m	Compression	0.5 m	1 m	8 N
50 N	0.8 m	Extension	0.24 m	1.04 m	15 N
48 N	2.4 m	Compression	0.4 m	2 m	8 N
60 N	1.25 m	Extension	0.25 m	1.5 m	12 N
25 N	0.9 m	Compression	0.18 m	0.72 m	5 N
40 N	1.6 m	Compression	0.2 m	1.4 m	5 N
16 N	2 m	Extension	0.1 m	2.1 m	0.8 N
14 N	1.8 m	Extension	0.9 m	2.7 m	7 N
49 N	3.5 m	Compression	1 m	2.5 m	14 N
60 N	1.2 m	Extension	0.8 m	2 m	40 N
30 N	2.5 m	Compression	0.5 m	2 m	6 N
y N	x m	Extension	x m	$2x$ m	y N
$2y$ N	x m	Compression	$\frac{x}{2}$ m	$\frac{x}{2}$ m	y N