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(12) **United States Design Patent**
Hung

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(54) **LINE SWITCH**

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(**) Term: **15 Years**

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(52) **U.S. Cl.**
USPC **D13/171**; D13/168

(58) **Field of Classification Search**
USPC D13/137.3, 137.4, 138.1, 139.6, 139.7,
D13/158, 160, 168, 170, 171
CPC H01H 9/0228; H01H 9/0235; H05B
33/0845; H05B 37/02; H05B 37/0272;
H05B 39/08; H02H 11/005
See application file for complete search history.

(56) **References Cited**

U.S. PATENT DOCUMENTS

D307,579 S *	5/1990	Layne	.....	D13/137.3
D351,375 S *	10/1994	Nagele	.....	D13/171
D391,922 S *	3/1998	Aromin	.....	D13/160
6,255,613 B1 *	7/2001	Yang	.....	H01H 9/0228 200/553
D465,476 S *	11/2002	Golding	.....	D14/223
D494,571 S *	8/2004	Polito	.....	D14/223
D499,086 S *	11/2004	Polito	.....	D14/218
D520,464 S *	5/2006	Strong	.....	D13/171
D524,295 S *	7/2006	Jacobson	.....	D14/218
D548,728 S *	8/2007	Yoshiyama	.....	D14/218
D585,428 S *	1/2009	Ikeda	.....	D13/168
D626,921 S *	11/2010	Pang	.....	D13/158

D633,447 S *	3/2011	Schaal	.....	D13/168
D637,178 S *	5/2011	Chiu	.....	D14/218
8,008,628 B2 *	8/2011	Boucly	.....	A61B 6/145 250/370.09
8,294,372 B2 *	10/2012	Yang	.....	H05B 37/0281 315/133
D726,130 S *	4/2015	Burgett	.....	D13/171
D743,381 S *	11/2015	Pi	.....	D14/218
9,320,115 B2 *	4/2016	Quaal	.....	H05B 37/0227
9,332,615 B1 *	5/2016	Peng	.....	H01H 9/0228
9,456,479 B1 *	9/2016	Peng	.....	H01H 19/08
D783,546 S *	4/2017	Peng	.....	D13/170
D786,825 S *	5/2017	Shifron	.....	D14/206
2008/0013225 A1 *	1/2008	Hung	.....	H02H 11/005 361/18
2008/0204956 A1 *	8/2008	Hung	.....	H05B 39/08 361/91.1
2012/0305375 A1 *	12/2012	Kwok	H01H 1/5866 200/293
2015/0109721 A1 *	4/2015	Willcocks	H05B 37/0272 361/679.01

(Continued)

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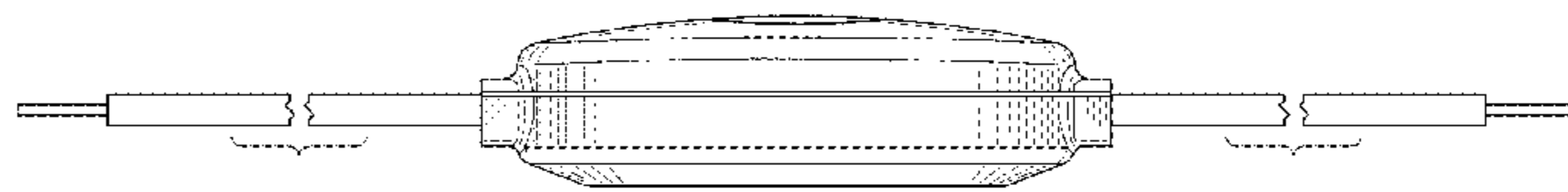
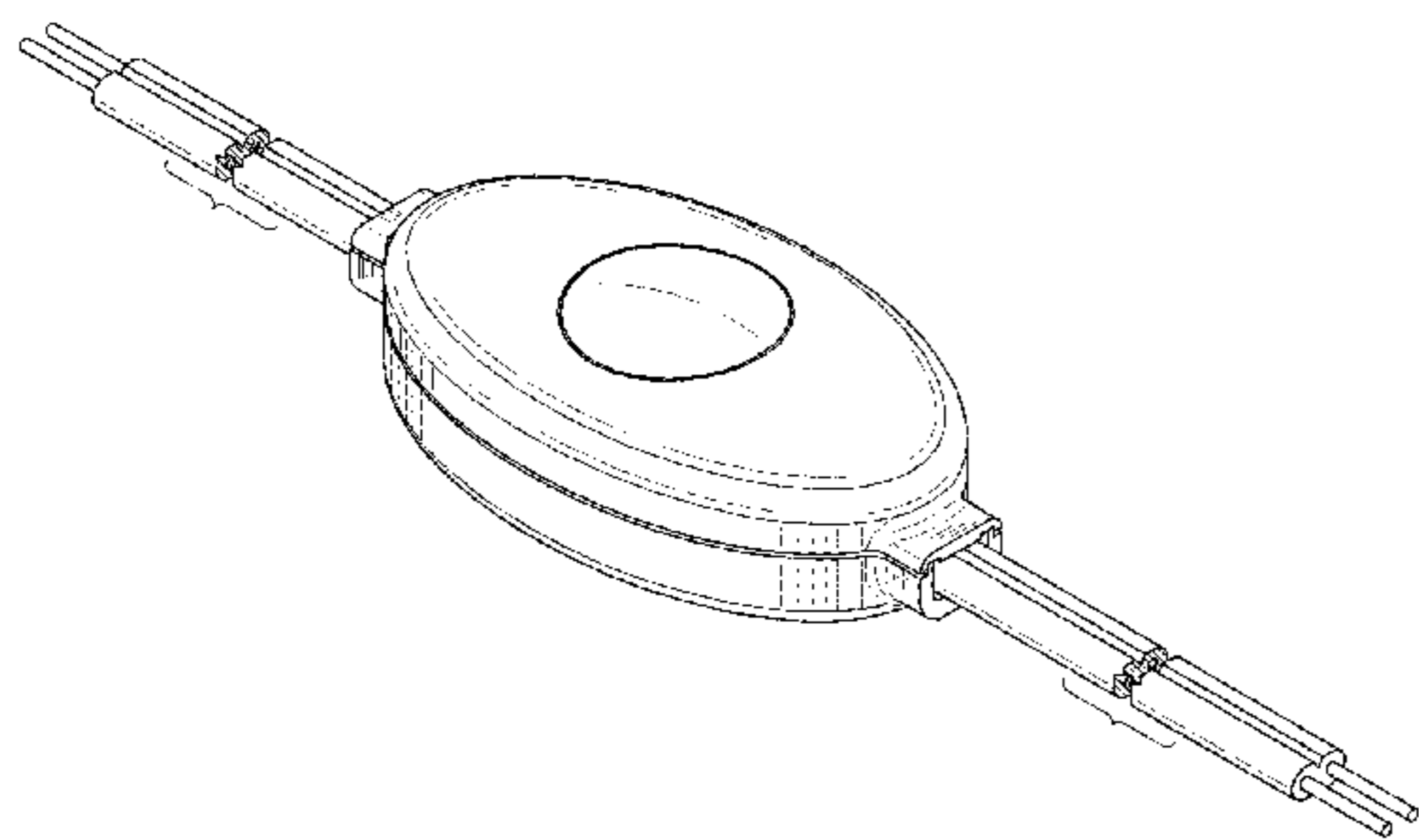
(57) **CLAIM**

The ornamental design for a line switch, as shown and described.

DESCRIPTION

FIG. 1 is a perspective view of the line switch;
FIG. 2 is a front view of FIG. 1;
FIG. 3 is a rear view of FIG. 1;
FIG. 4 is a left side view of FIG. 1;
FIG. 5 is a right side view of FIG. 1;
FIG. 6 is a top view of FIG. 1; and,
FIG. 7 is a bottom view of FIG. 1.
The wire is shown broken away in the drawings to indicate indeterminate length, it being understood that it has a uniform shape and appearance throughout its length.

1 Claim, 4 Drawing Sheets



(56)

References Cited

U.S. PATENT DOCUMENTS

2016/0380424 A1* 12/2016 Aromin H02H 3/162
361/50
2017/0140884 A1* 5/2017 Peng H01H 1/5805

* cited by examiner

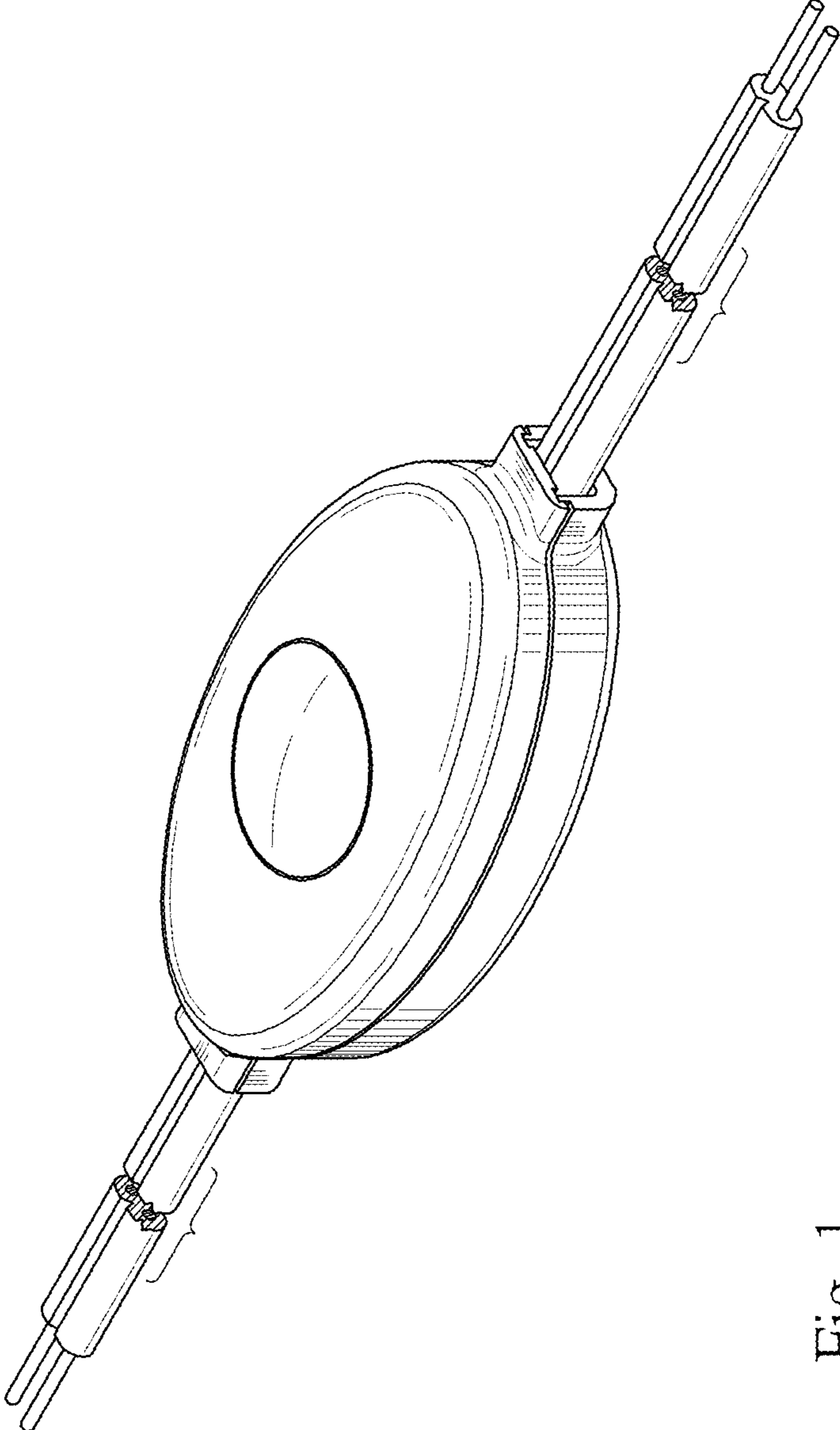


Fig. 1

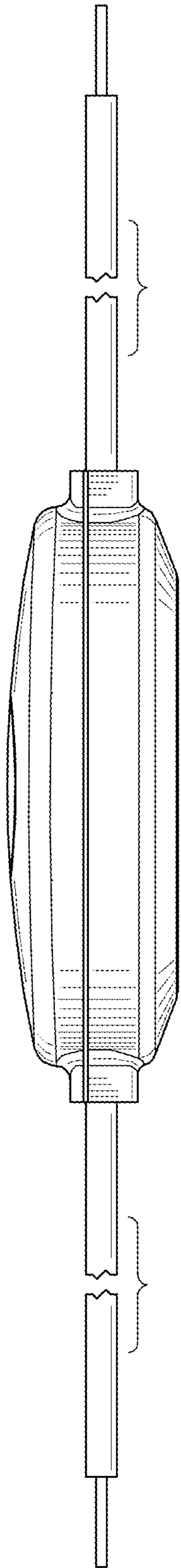


Fig. 2

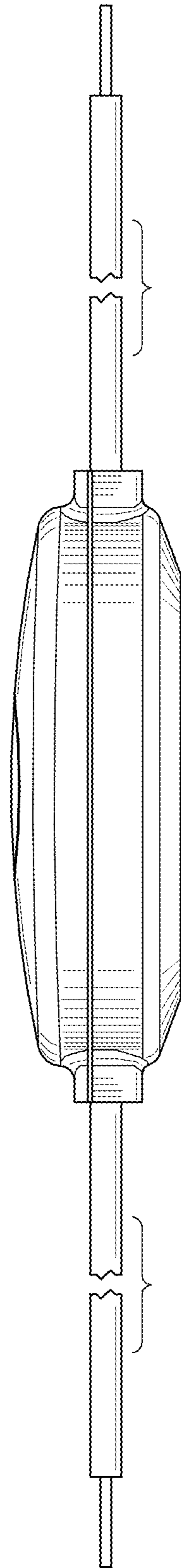


Fig. 3

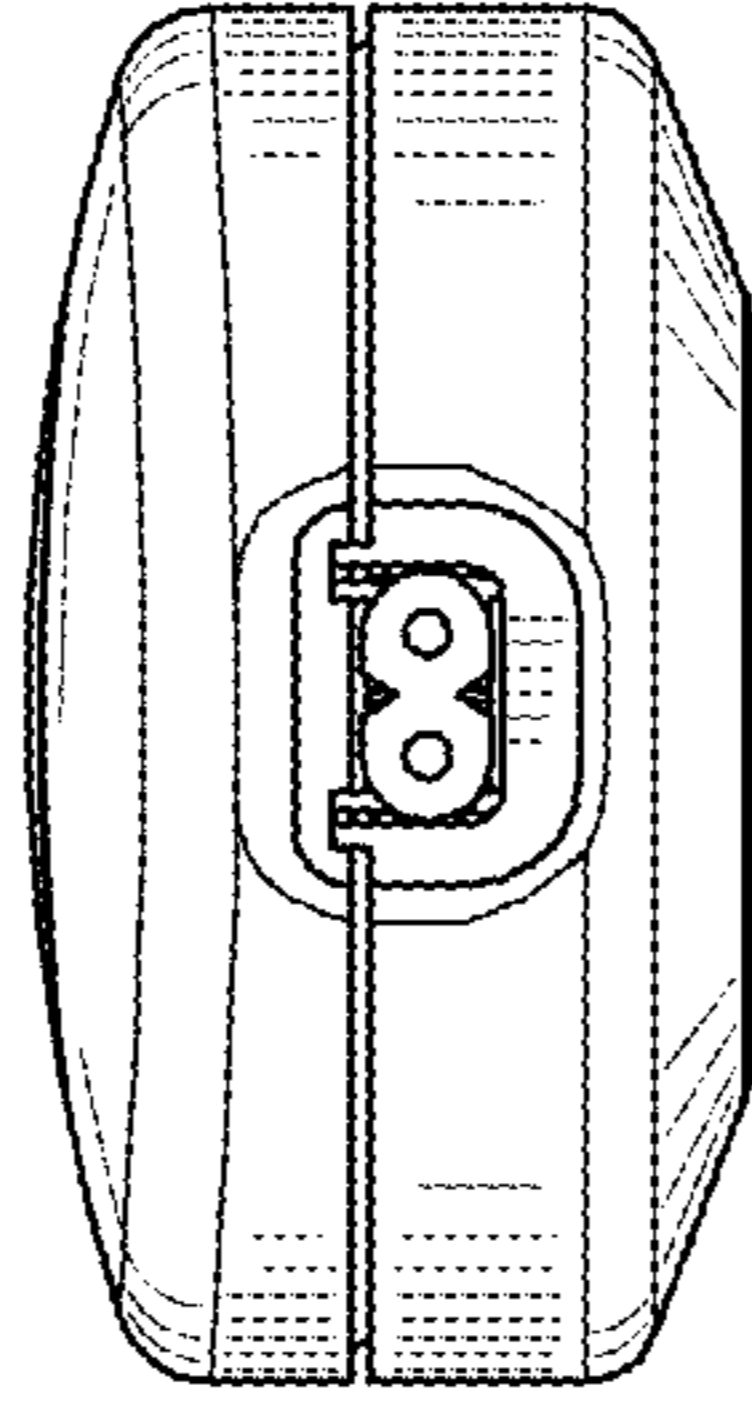


Fig. 4

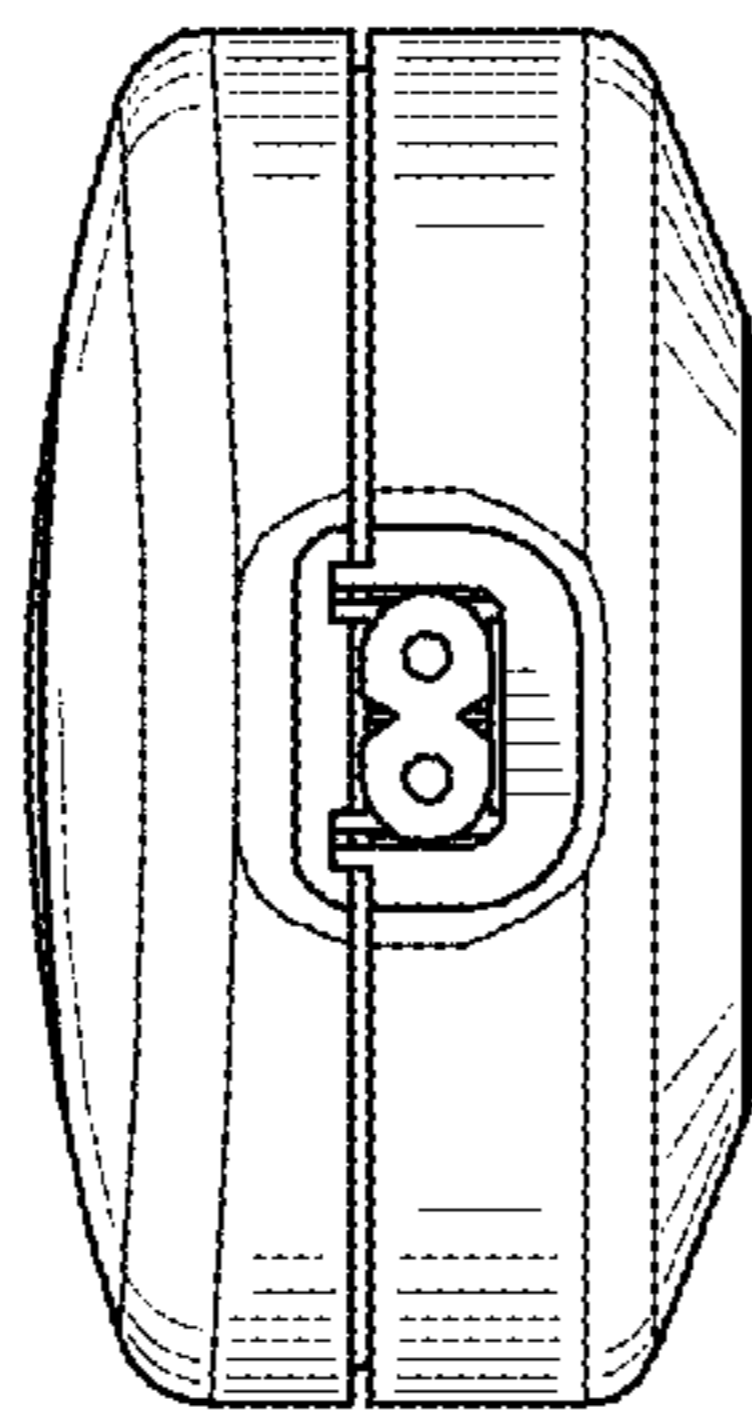


Fig. 5

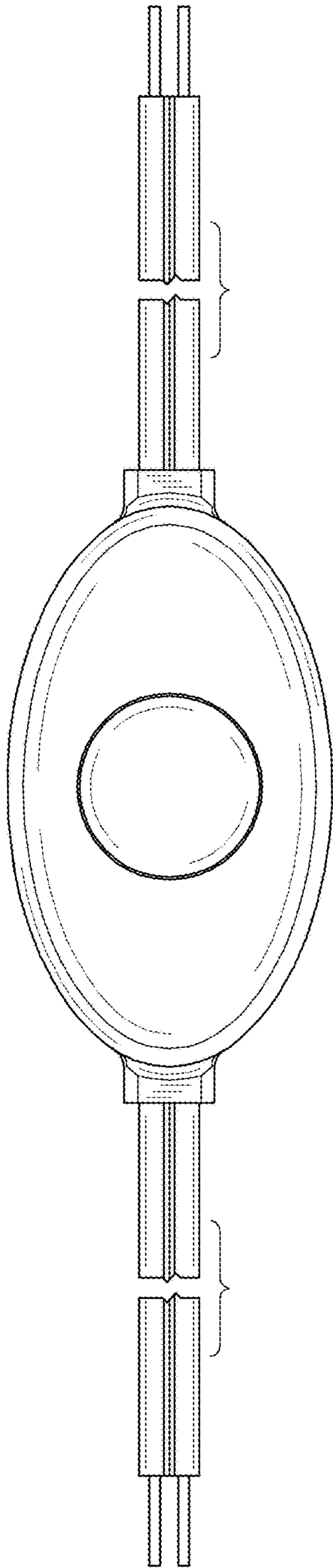


Fig. 6

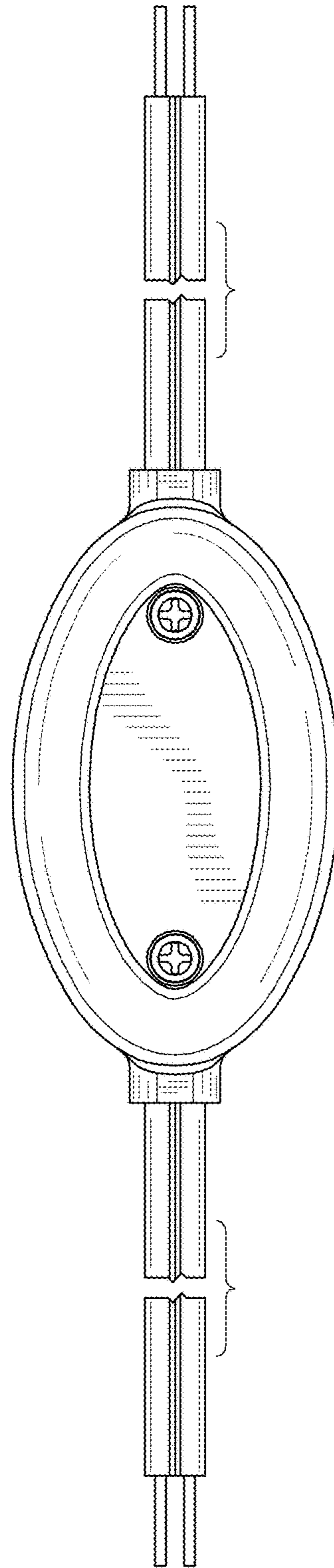


Fig. 7