



US00D887527S

(12) **United States Design Patent**  
**Koiwa et al.**

(10) **Patent No.:** **US D887,527 S**

(45) **Date of Patent:** **\*\* Jun. 16, 2020**

(54) **WRENCH SOCKET FOR SPRINKLER HEAD**

6,957,477 B1 \* 10/2005 Neiman ..... B25B 27/14  
29/278

(71) Applicant: **SENJU SPRINKLER CO., LTD.**,  
Adachi-ku, Tokyo (JP)

7,055,614 B1 6/2006 Ide  
D570,955 S \* 6/2008 Franson ..... D23/213  
D673,825 S \* 1/2013 Koiwa ..... D8/14  
D868,574 S \* 12/2019 Pittman ..... D8/396

(72) Inventors: **Yasuaki Koiwa**, Tokyo (JP); **Hisayoshi Ohkoshi**, Tokyo (JP)

(Continued)

(73) Assignee: **SENJU SPRINKLER CO., LTD.**,  
Adachi-ku, Tokyo (JP)

**FOREIGN PATENT DOCUMENTS**

TW 160588 5/2014  
TW 201741000 A 12/2017

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

(21) Appl. No.: **29/656,235**

(22) Filed: **Jul. 11, 2018**

(30) **Foreign Application Priority Data**

Jan. 12, 2018 (JP) ..... 2018-000345

(51) **LOC (12) Cl.** ..... **23-01**

(52) **U.S. Cl.**  
USPC ..... **D23/214**

(58) **Field of Classification Search**

USPC ..... D23/213, 214, 218, 227, 254; D8/350,  
D8/352, 399; D21/443, 444; D30/119,  
D30/121, 123, 124, 131, 132, 160;  
D24/130; D15/144, 144.1, 144.2  
CPC ..... B05B 15/70; B05B 15/74; B05B 15/00;  
A01G 3/06; A63F 13/10; A62C 37/08;  
A62C 31/02

See application file for complete search history.

(56) **References Cited**

**U.S. PATENT DOCUMENTS**

4,085,633 A \* 4/1978 Jackson ..... B25B 13/48  
81/111  
D359,340 S \* 6/1995 Morgan ..... D23/213  
D428,326 S \* 7/2000 Nakamura ..... D8/356  
6,487,942 B1 12/2002 Carter et al.  
6,796,013 B2 \* 9/2004 Melker ..... B25B 13/48  
29/240

**OTHER PUBLICATIONS**

Senju Wrench Socket FR-H II [Dec. 13, 2019] found online [Dec. 13, 2019]—<https://www.senjuprinkler.com/product/wrench-socket-fr-h-ii/>.\*

(Continued)

*Primary Examiner* — Brandon M Rosati

*Assistant Examiner* — John A Voytek

(74) *Attorney, Agent, or Firm* — Buchanan Ingersoll & Rooney PC

(57)

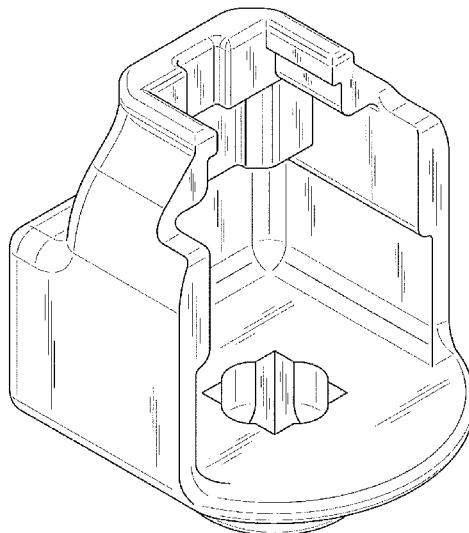
**CLAIM**

The ornamental design for a wrench socket for a sprinkler head, as shown and described.

**DESCRIPTION**

FIG. 1 is a front elevational view of a wrench socket for a sprinkler head showing our new design;  
FIG. 2 is a rear elevational view thereof;  
FIG. 3 is a left side elevational view thereof; a right side elevational view thereof being a same image;  
FIG. 4 is a top plan view thereof;  
FIG. 5 is a bottom plan view thereof;  
FIG. 6 is a cross-sectional view thereof taken along line 6-6 in FIG. 1; and,  
FIG. 7 is a perspective view thereof.

**1 Claim, 7 Drawing Sheets**



(56)

**References Cited**

## U.S. PATENT DOCUMENTS

|              |     |         |                 |                       |
|--------------|-----|---------|-----------------|-----------------------|
| 2005/0103888 | A1* | 5/2005  | Corbett .....   | B05B 15/62<br>239/276 |
| 2006/0219817 | A1* | 10/2006 | Franson .....   | A62C 37/08<br>239/502 |
| 2013/0334809 | A1* | 12/2013 | Cole, Jr. ....  | B05B 15/00<br>285/13  |
| 2015/0075334 | A1  | 3/2015  | Watson et al.   |                       |
| 2019/0143163 | A1* | 5/2019  | Schnell .....   | A62C 35/68<br>169/37  |
| 2019/0175968 | A1* | 6/2019  | Pressnell ..... | A62C 35/68            |

## OTHER PUBLICATIONS

Office Action (Notice of Allowance) dated Oct. 26, 2018, by the Taiwanese Patent Office in corresponding Taiwanese Patent Application No. 107302833. (3 pages).

\* cited by examiner

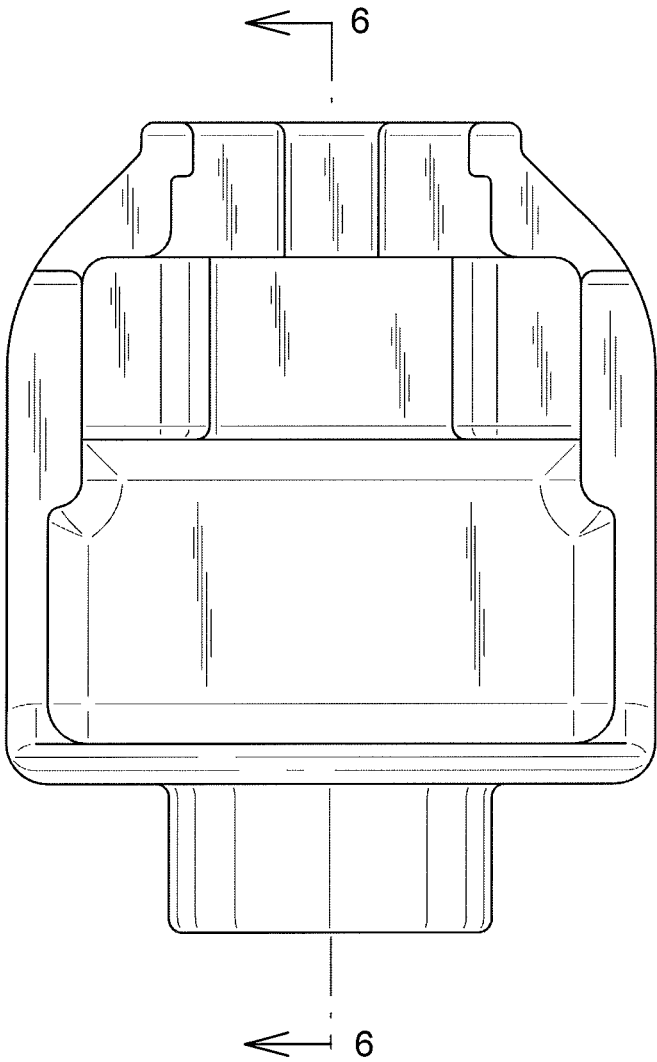


FIG. 1

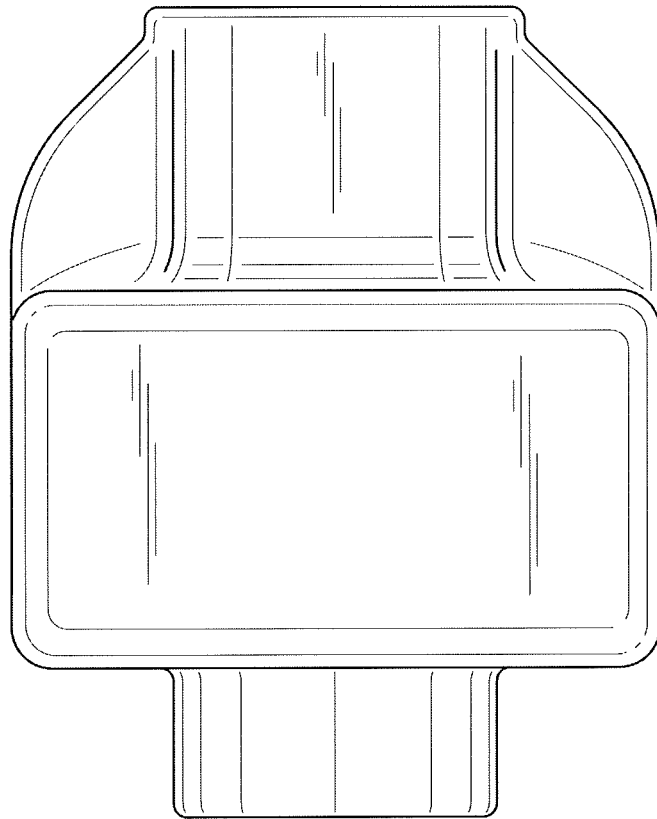


FIG. 2

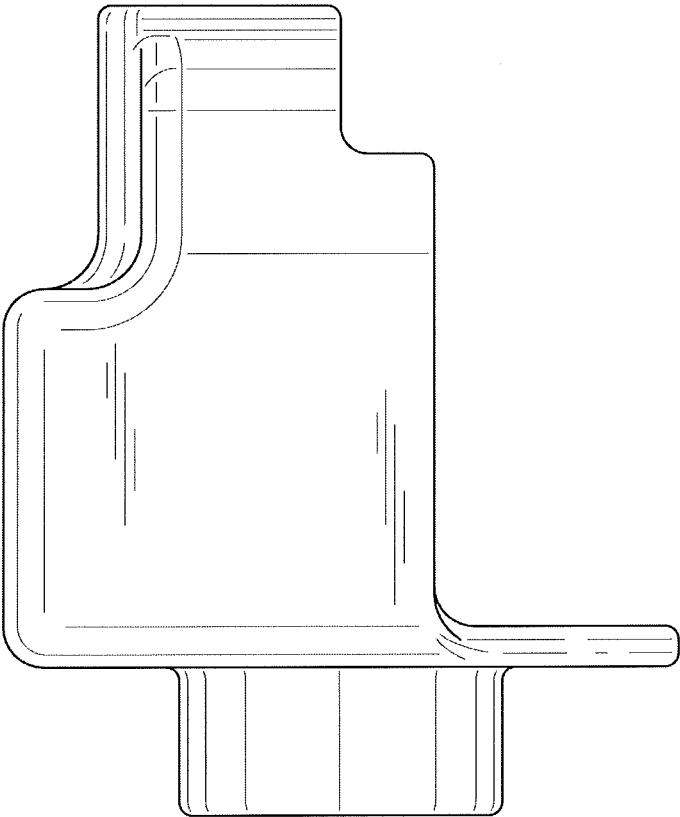


FIG. 3

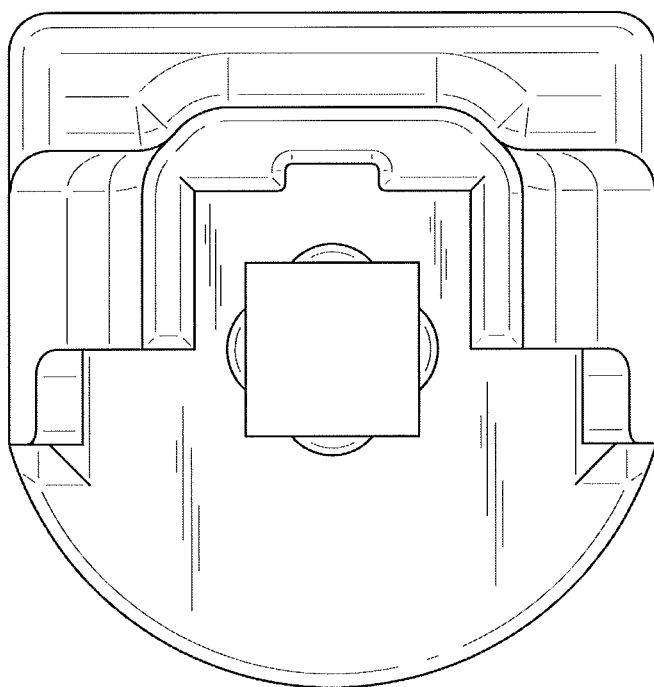


FIG. 4

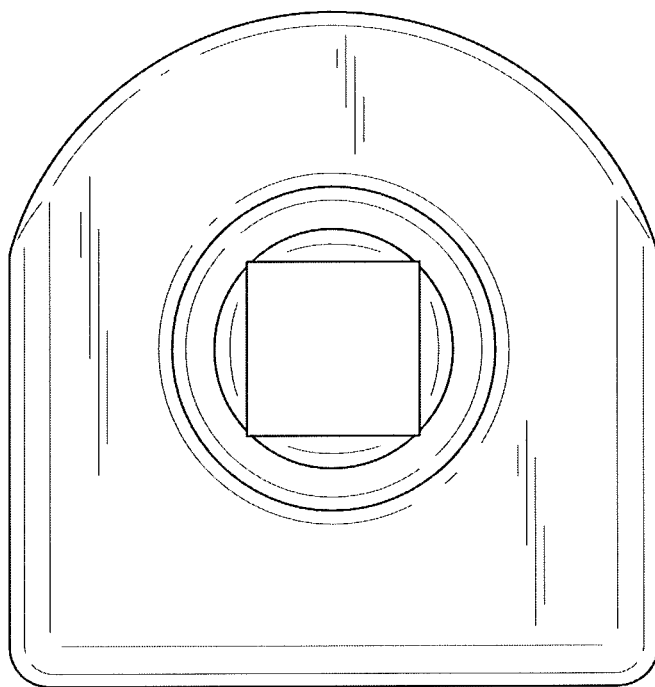


FIG. 5

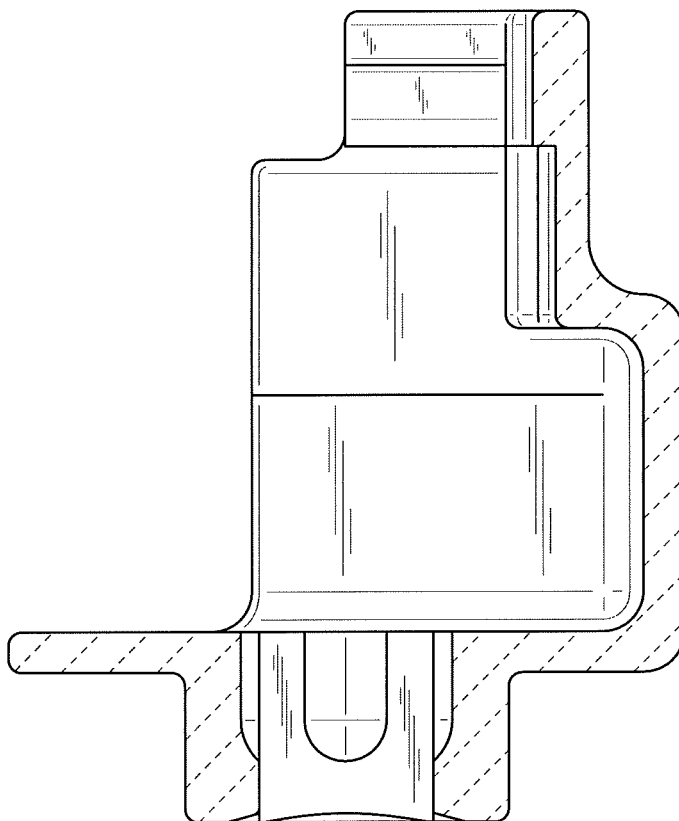


FIG. 6

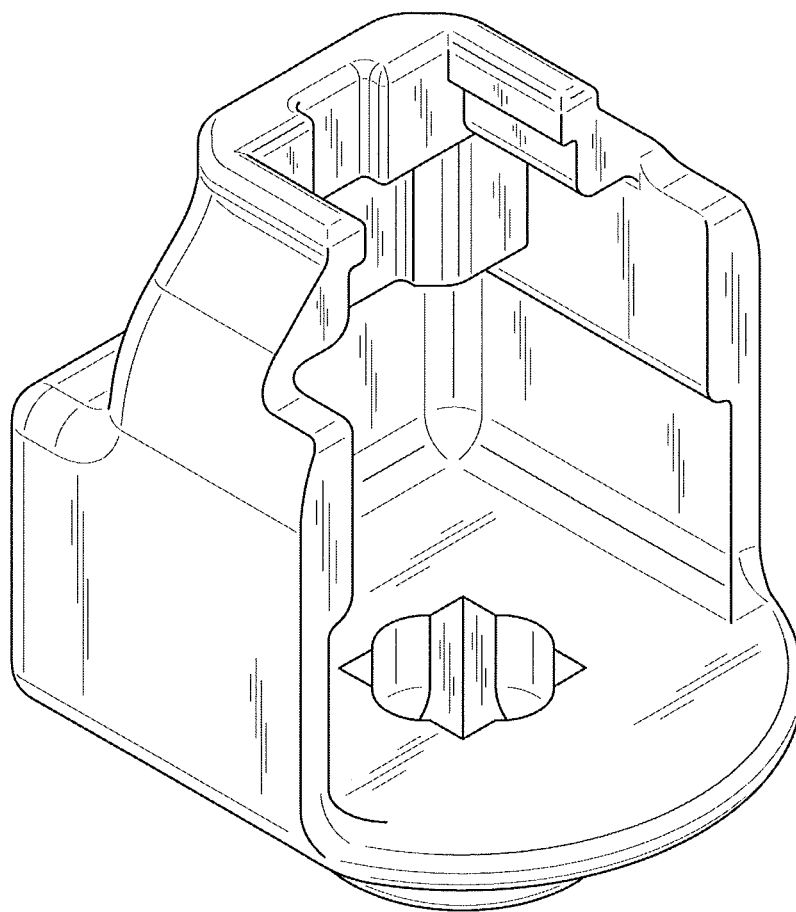


FIG. 7