



US008898973B2

(12) **United States Patent**  
Miller

(10) **Patent No.:** US 8,898,973 B2  
(45) **Date of Patent:** Dec. 2, 2014

(54) **BUILDING CAVITY VENTILATION SYSTEM**

(56) **References Cited**

(71) Applicant: **Solar Innovations, Inc.**, Pine Grove, PA (US)

U.S. PATENT DOCUMENTS

(72) Inventor: **Gregory E. Miller**, Pine Grove, PA (US)

3,410,027	A	11/1968	Bates	
3,636,660	A *	1/1972	Peterson	49/408
4,656,803	A *	4/1987	Chludil	52/209
5,044,121	A *	9/1991	Harbom et al.	49/401
7,574,829	B1 *	8/2009	Prager	49/408
7,650,721	B2 *	1/2010	Nevins	52/173.3
8,033,056	B2 *	10/2011	Wernlund et al.	49/408
2008/0092456	A1 *	4/2008	Millett et al.	52/1

(73) Assignee: **Solar Innovations, Inc.**, Pine Grove, PA (US)

(\* ) Notice: Subject to any disclaimer, the term of this patent is extended or adjusted under 35 U.S.C. 154(b) by 0 days.

\* cited by examiner

(21) Appl. No.: 13/776,106

Primary Examiner — William Gilbert

Assistant Examiner — Kyle Walraed-Sullivan

(22) Filed: Feb. 25, 2013

(74) Attorney, Agent, or Firm — Shlesinger, Arkwright & Garvey LLP

(65) **Prior Publication Data**

US 2014/0237918 A1 Aug. 28, 2014

(57) **ABSTRACT**

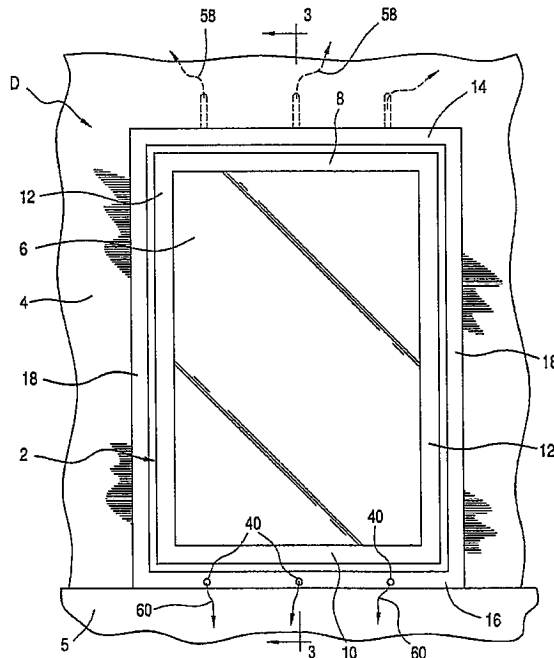
(51) **Int. Cl.**  
*E06B 7/02* (2006.01)  
*E06B 3/667* (2006.01)  
*E06B 3/677* (2006.01)

A system for ventilating the cavity of a fixed or movable window or door construction of a building, the window or door having an upper sill or header and a low sill provided with weep holes and a pair of jamb elements, the system comprising a vent member operative associated with the upper sill portion, the vent member is in fluid communication with the upper sill at one end thereof and also with the interior of the building at an opposite end thereof, the vent member extends vertically above the upper sill a distance sufficient to vent pressure within the cavity to the interior of the building so that water is caused to be readily conveyed out of the weep holes regardless of any pressure differential between the interior and exterior of the building.

(52) **U.S. Cl.**  
CPC . *E06B 7/02* (2013.01); *E06B 3/677* (2013.01);  
*E06B 2007/026* (2013.01)  
USPC ..... 52/209; 52/302.3

(58) **Field of Classification Search**  
USPC ..... 52/209, 204.52, 204.5, 302.1, 302.3,  
52/302.6, 220.8; 359/258, 265;  
454/70-74, 195, 196, 211, 213, 340  
See application file for complete search history.

15 Claims, 4 Drawing Sheets



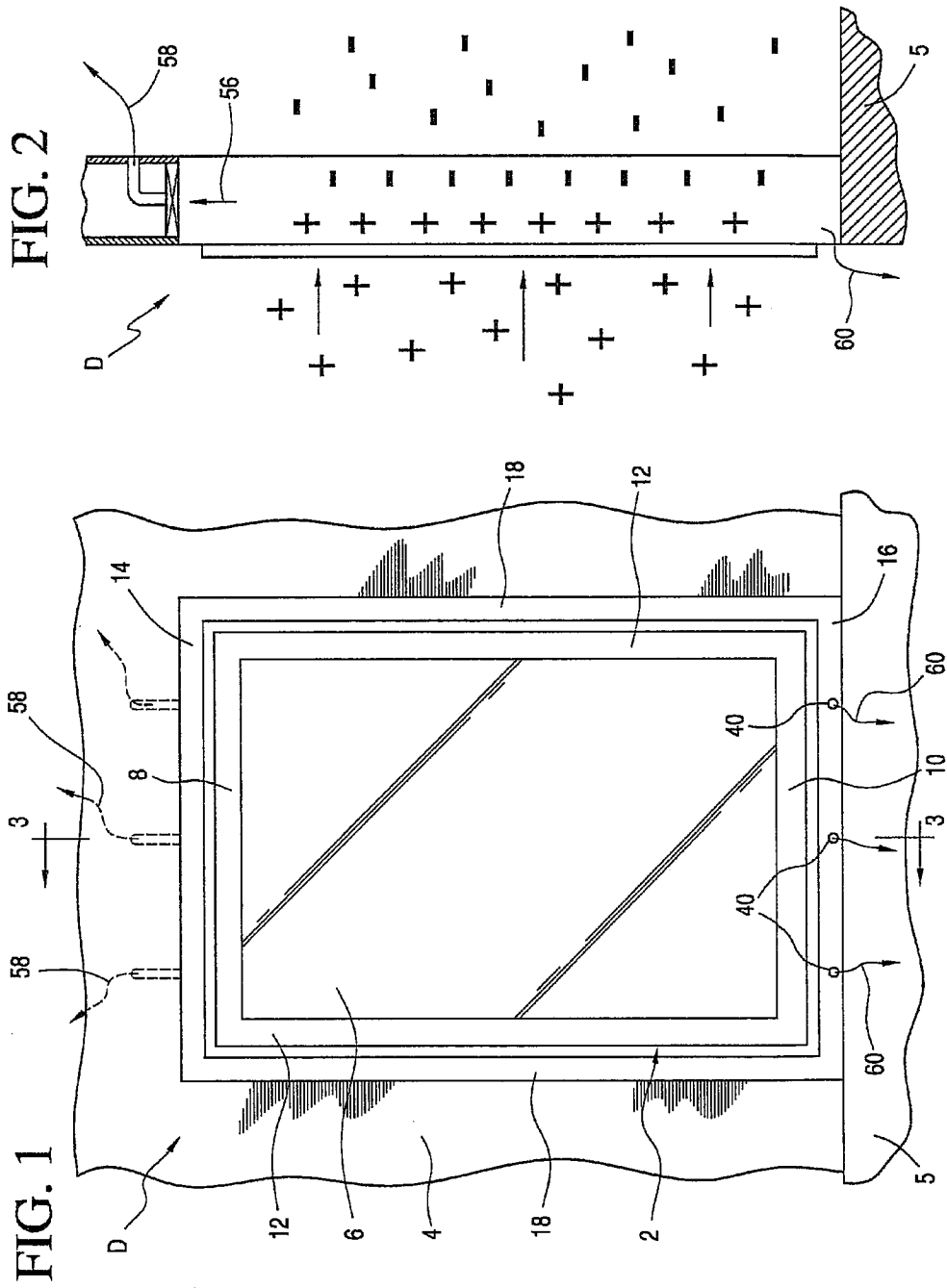


FIG. 3

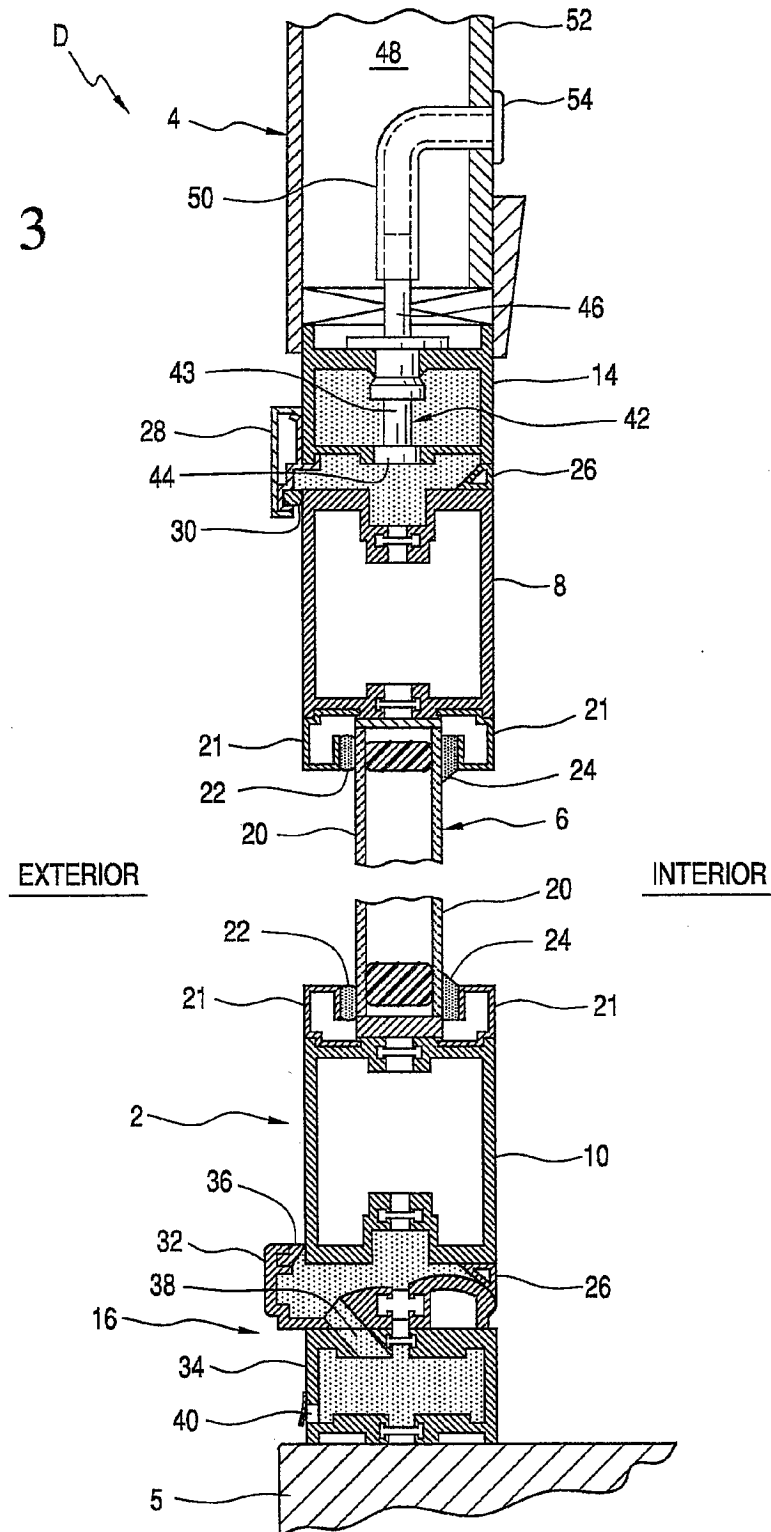


FIG. 4

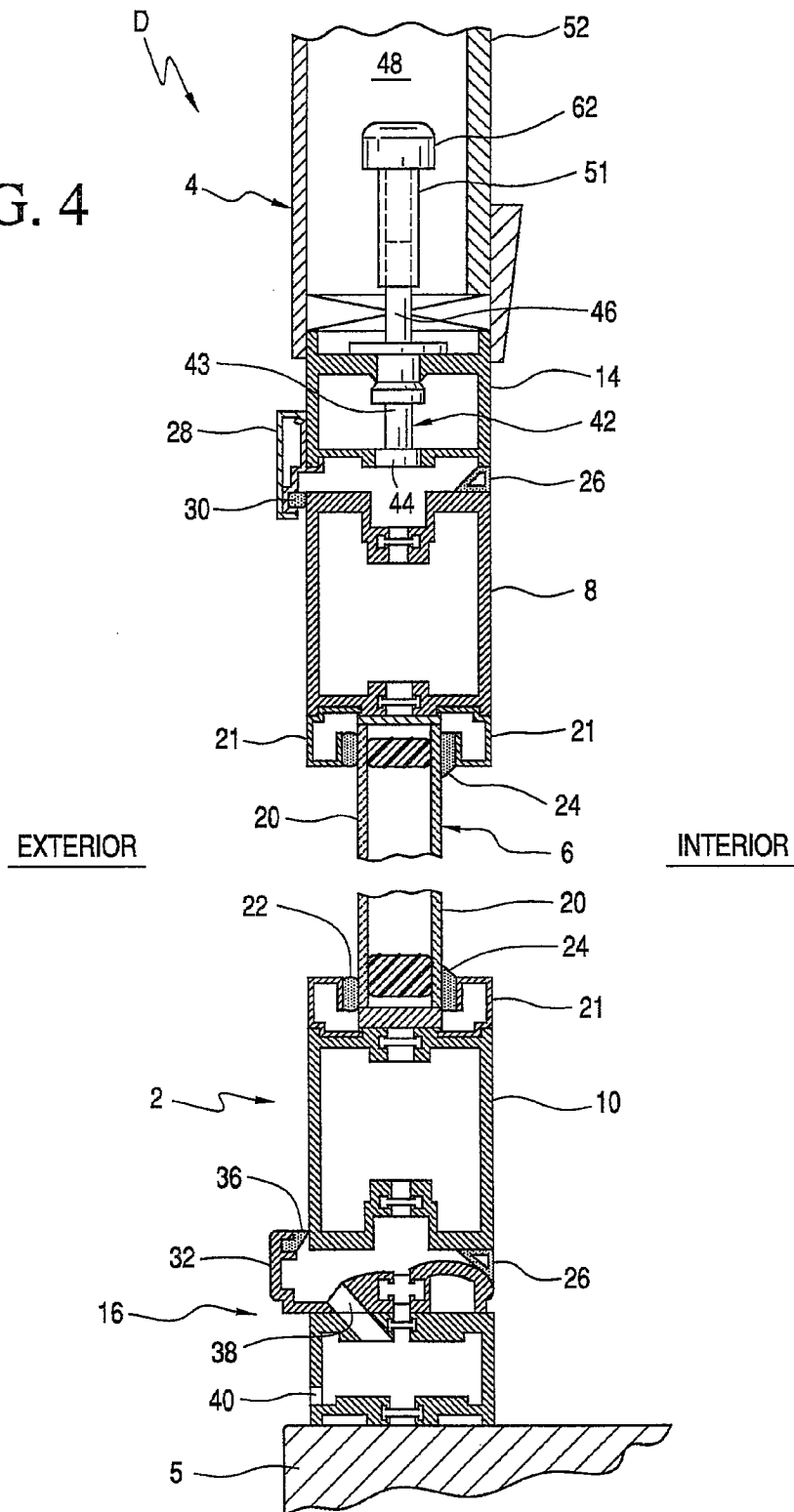


FIG. 5  
(Prior Art)

