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U.S. Patent No. 11,982,285 entitled “Compressor” issued May 14, 2024 to BMTS Technology GmbH & Co. KG of Stuttgart, Germany. Invented by Steffen Schmitt of Ditzingen, Germany; Rüdiger Kleinschmidt of Besigheim, Germany and Frieder Stetter, Oliver Kuhne and Gunter Winkler all of Stuttgart, Germany. Abstract: The invention relates to a compressor (20) for generating a compressed air flow for a fuel cell (10), having a compressor element (21), in particular a compressor wheel, wherein the compressor element (21) is coupled in a to a drive shaft (23) for co-rotation, the drive shaft (23) being driven by a motor (22), in particular an electric motor, wherein at least one hydrodynamic or hydrostatic bearing (24, 25) is used to mount the shaft (23) in a rotatable manner, wherein the plain bearing (24, 25) is connected to a lubricant supply means (30), which is used to supply a lubricant for hydrodynamic or hydrostatic pressure generation to the plain bearing (24, 25), wherein the lubricant is water or a fluid mixture, predominantly comprising water, wherein the plain bearing (24, 25) has a lubricant inlet and a lubricant outlet, wherein the lubricant can be routed to the plain bearing (24, 25) via the lubricant inlet and the lubricant can be discharged from the plain bearing (24, 25) via the lubricant outlet, and wherein a discharge area of the circulation system (30) is disposed in the area of the lubricant outlet. An operationally safe design can be implemented for such a compressor if provision is made for the cross-section area of the outlet of the liquid outlet of the plain bearing (24, 25) to be completely covered by the lubricant held in the discharge area.

U.S. Patent No. 11,980,955 entitled “Circular Saws with Lock Assemblies” issued May 14, 2024 to Festool GmbH of Wendlingen am Neckar, Germany. Invented by Johannes Rau of Plochingen, Germany and Tobias Hoefer of Urbach, Germany. Abstract: Circular saws with lock assemblies are disclosed herein. The circular saws include a motor including a motor shaft configured to rotate about a shaft rotational axis. The circular saws also include an arbor configured to operatively attach a circular saw blade to the circular saw. The circular saws further include a switch configured to selectively apply an electric current to the motor and a switch lever configured to be selectively actuated, by a user of the circular saw and via an actuation force, to actuate the switch and direct the switch to apply the electric current to the motor. The lock assemblies include a switch lock, which defines a switch-locked configuration, in which the switch lock resists actuation of the switch lever by the user, and a switch-unlocked configuration, in which

the switch lever is free to be actuated by the user.

U.S. Patent No. 11,982,954 entitled “Developing Device” issued May 14, 2024 to Canon Kabushiki kaisha of Tokyo, Japan. Invented by Takahiro Suzuki of Saitama, Japan and Tomoyuki Sakamaki of Tokyo, Japan. Abstract: With respect to a rotational direction of a rotatable developing member of a developing device, an opposing position where a regulating portion of the developing device is opposed to an outer peripheral surface of the rotatable developing member is between a first maximum position and a position where a magnetic flux density of a regulating pole in a tangential direction relative to the outer peripheral surface of the rotatable developing member is zero. With respect to the rotational direction of the rotatable developing member, the position where the magnetic flux density of the regulating pole in the tangential direction relative to the outer peripheral surface of the rotatable developing member is zero is within a range of ?2? of a midpoint between the first maximum position and a second maximum position or is downstream of the range.

U.S. Patent No. 11,980,954 entitled “Portable Automated Notching Machine” issued May 14, 2024 to ABG Design LLC of Franklin, Tennessee. Invented by Miller Caldwell Garrett of Franklin, Tennessee; Nicholas Keith Anselmo of Yorktown, Virginia and Taylor Louis Bobrow of Chesapeake, Virginia. Abstract: A portable machine includes a controller to receive target parameters associated with a workpiece to be worked. A front assembly includes a first baseplate which is stationary during operation, a first actuator to controllably move the workpiece bidirectionally along a longitudinal axis thereof, a second actuator to controllably rotate a second baseplate relative to the first baseplate, and at least one tooling unit. A rear assembly includes a third baseplate with a rolling base, a fourth baseplate rotatably coupled to the third baseplate, and a rear workpiece clamp. Sensors generate signals representing a distance between the first and third baseplates, an orientation of the first baseplate relative to the second baseplate, and an orientation of the third baseplate relative to the fourth baseplate. The controller generates control signals to the tooling unit and the first and second actuators based on at least the target parameters and the sensor signals.

U.S. Patent No. 11,982,451 entitled “Apparatus and Process for Amateur HVAC Installation” issued May 14, 2024 to JOI Holding, LLC of Boaz, Kentucky. Invented by Jason Ingram also of Boaz, Kentucky. Abstract: An improved support structure for a valve stem positioned within a valve passageway of an HVAC line set quick connector is disclosed herein. The support structure may include a ring-shaped portion, a plurality of angled legs extending peripherally away and below the ring-shaped portion, and a plurality of terminal portions. The ring-shaped portion may be configured to surround the valve stem. Each of the plurality of terminal portions may be coupled to one of the plurality of legs and may further include an arcuate surface configured to engage the valve passageway of the HVAC line set quick connect. The improved support structure is configured to increase a cross-sectional opening area through the support structure such that coolant flowing through the HVAC line set quick connector is not substantially restricted.