

EXHIBIT 38

(12) **United States Patent**
Krasnov et al.

(10) **Patent No.:** US 6,632,563 B1
(45) **Date of Patent:** Oct. 14, 2003

(54) **THIN FILM BATTERY AND METHOD OF MANUFACTURE**

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(*) Notice: Subject to any disclaimer, the term of this patent is extended or adjusted under 35 U.S.C. 154(b) by 11 days.

(21) Appl. No.: **09/656,012**

(22) Filed: **Sep. 7, 2000**

(51) **Int. Cl.**⁷ **H01M 6/46**

(52) **U.S. Cl.** **429/162; 429/127**

(58) **Field of Search** 429/162, 127

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(List continued on next page.)

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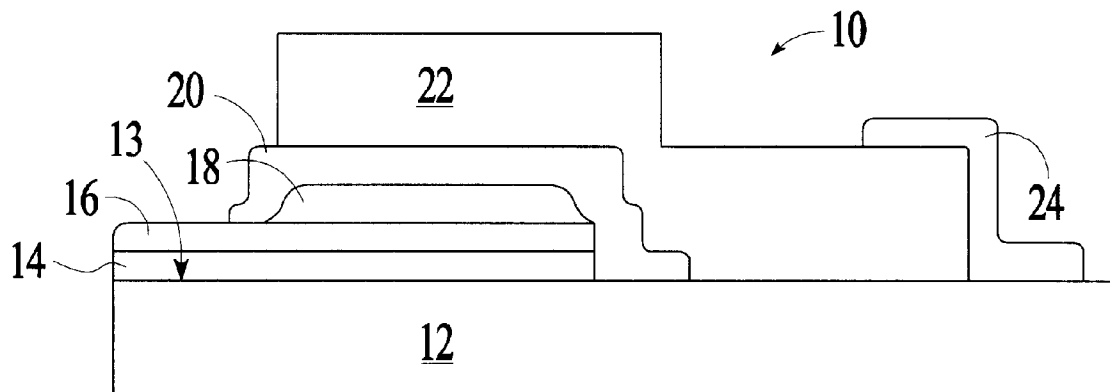
Assistant Examiner—Gregg Cantelmo

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(57) **ABSTRACT**

A thin film battery **10** comprises a substrate **12** which permits the battery **10** to be fabricated to provide higher energy density. In one embodiment, the substrate **12** of the battery **10** comprises mica. A crystalline lithium metal oxide film may be used as the cathode film **18**.

17 Claims, 3 Drawing Sheets



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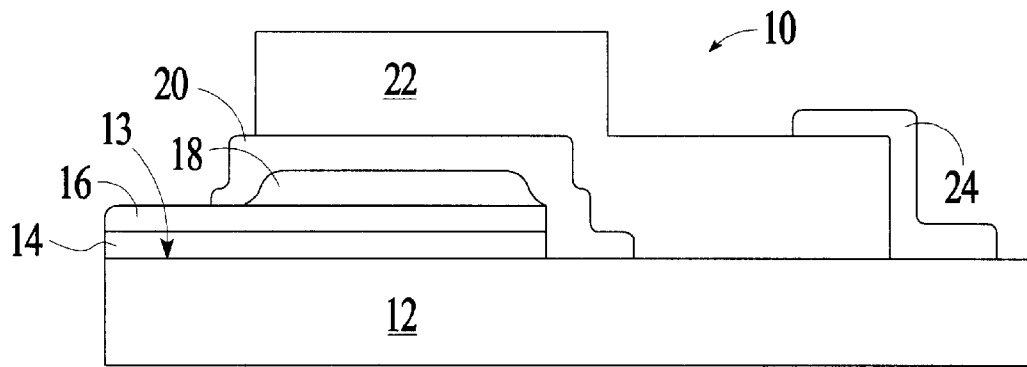


FIG. 1

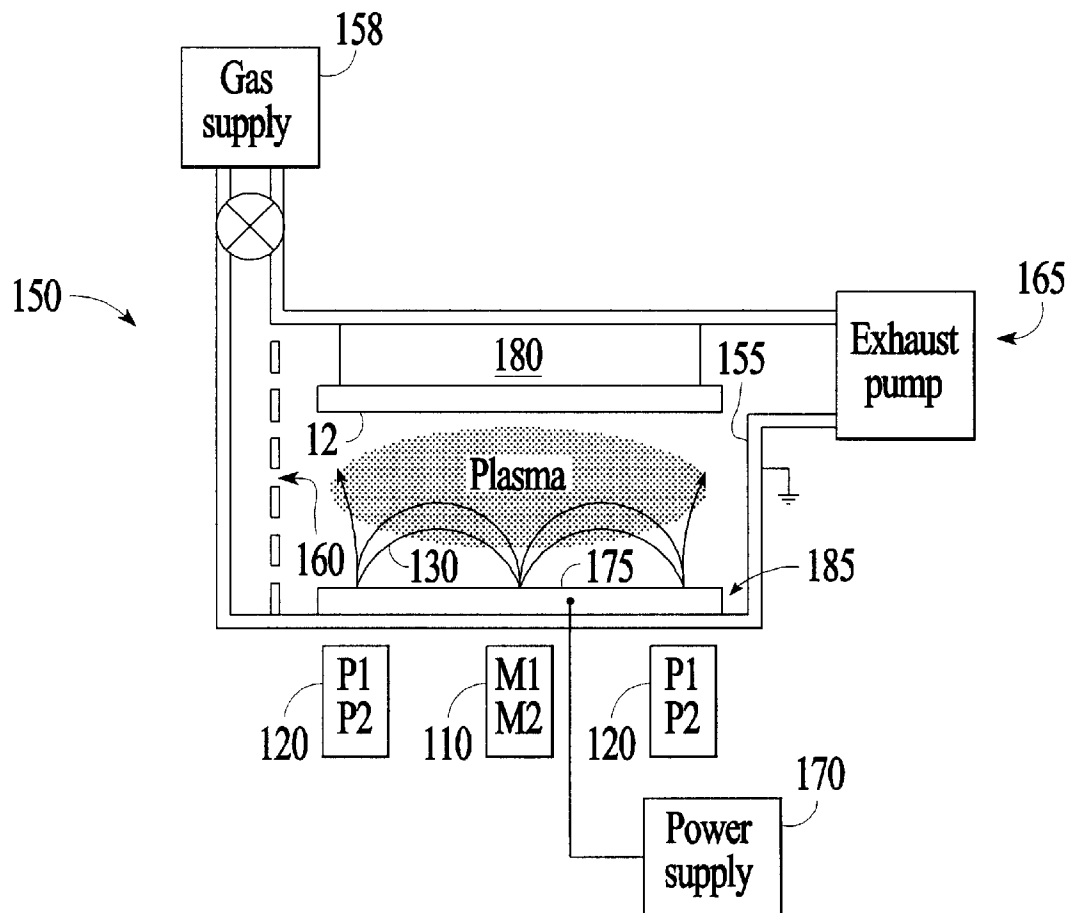


FIG. 3

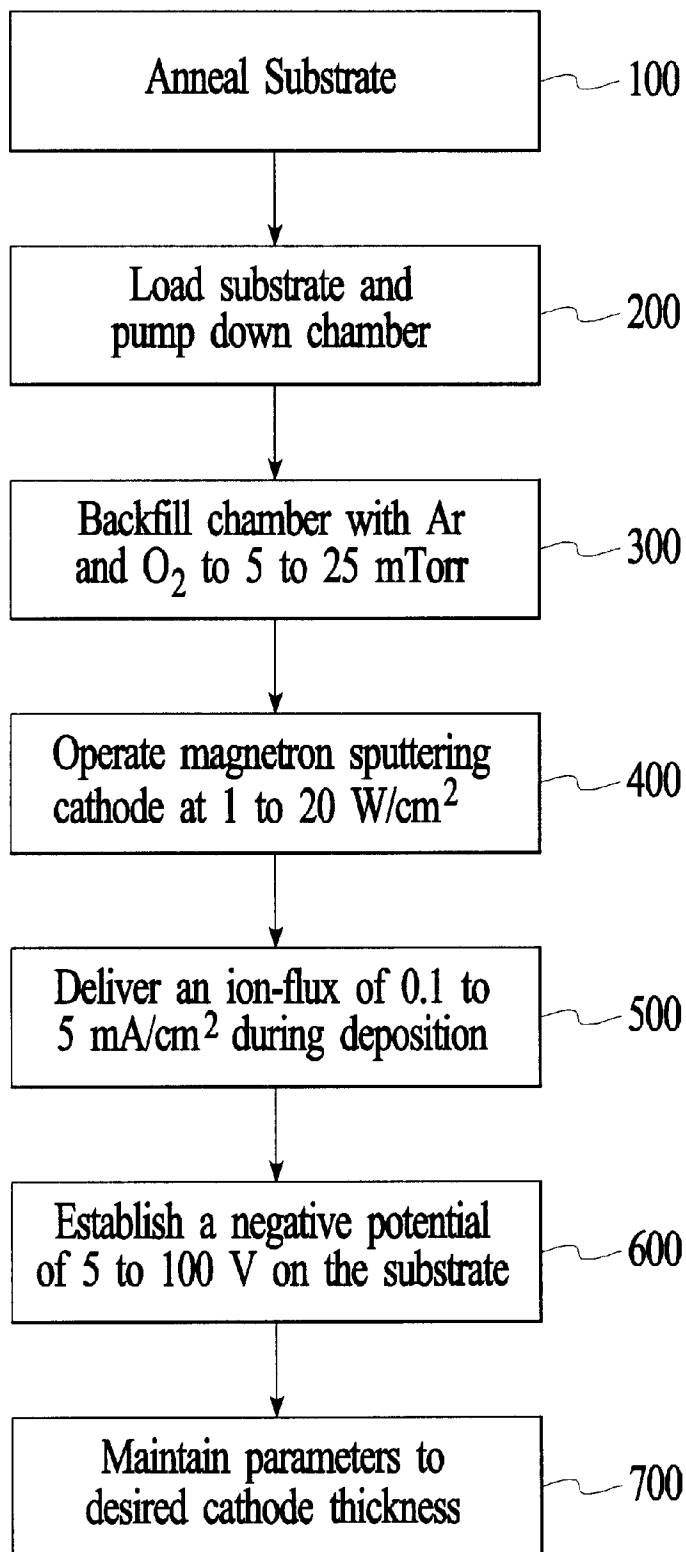


FIG. 2

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