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Yehle

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(54) **DRAW MECHANISM FOR A CROSSBOW**

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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 450 days.

(57) **ABSTRACT**

(21) Appl. No.: **11/933,394**

A draw mechanism for a crossbow comprises a drive gear, coupling gear, retaining member, one-way rotary clutch, retainer, rotary drive member, tension member, and catch. The drive gear is coupled to the coupling gear. The retaining member and coupling gear are coaxially coupled by the one-way rotary clutch. The retainer releasably engages the retaining member. The coupling gear is coupled to the rotary drive member which is engaged with the tension member. The catch is connected to the tension member and retains a bow-string as the crossbow is drawn. Rotation of the coupling gear in one direction causes the rotary drive member to tension the tension member to move the catch to draw the crossbow. Engagement of the retainer with the retaining member retards rotation of the coupling gear in the other direction thereby retarding movement of the catch to “undraw” the crossbow. Release by the retainer allows movement of the catch to undraw the crossbow.

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(51) **Int. Cl.**
F41B 5/12 (2006.01)

(52) **U.S. Cl.** **124/25**

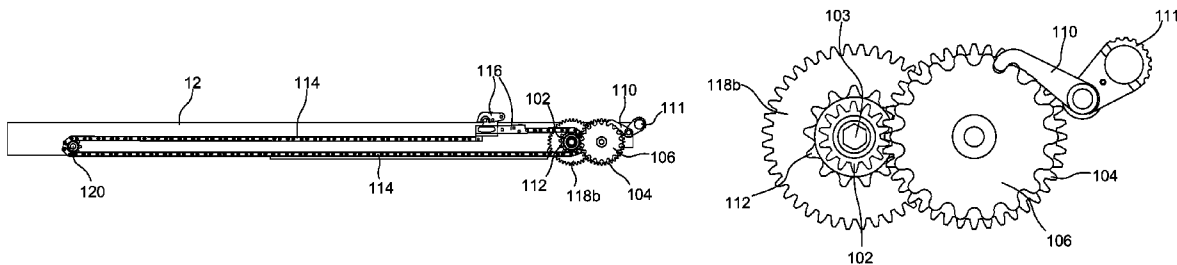
(58) **Field of Classification Search** **124/25**
See application file for complete search history.

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26 Claims, 4 Drawing Sheets



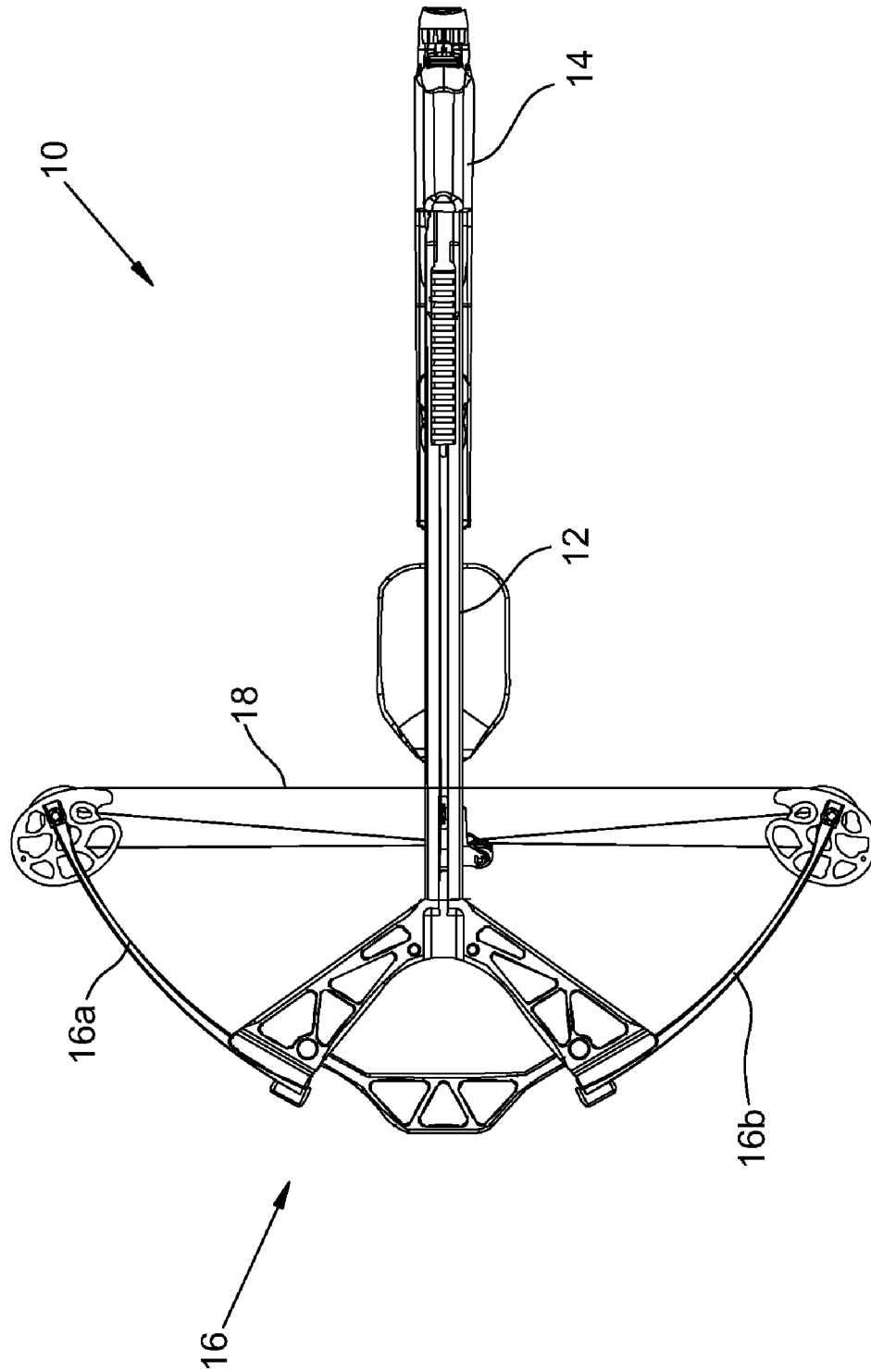


FIG. 1

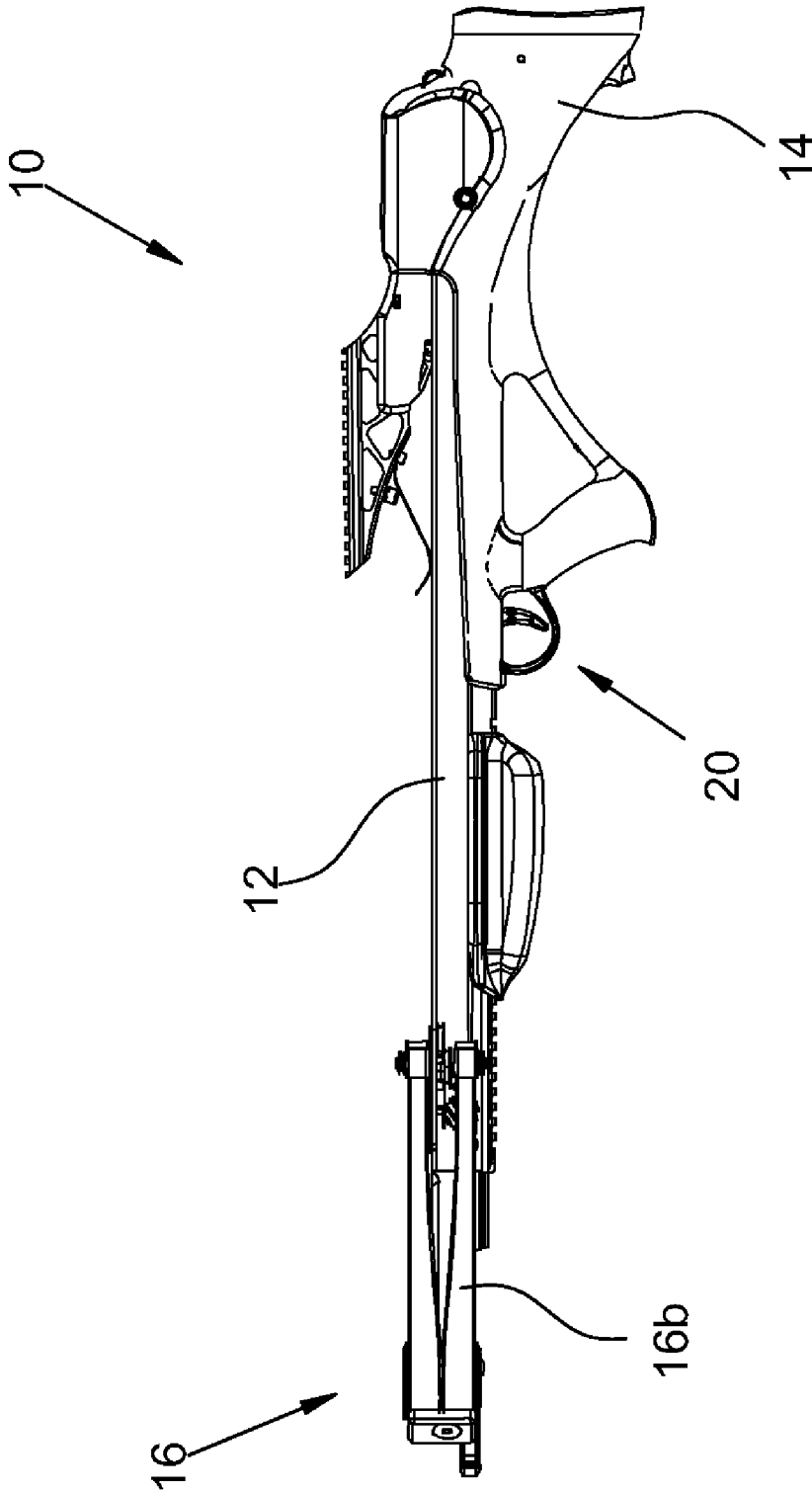
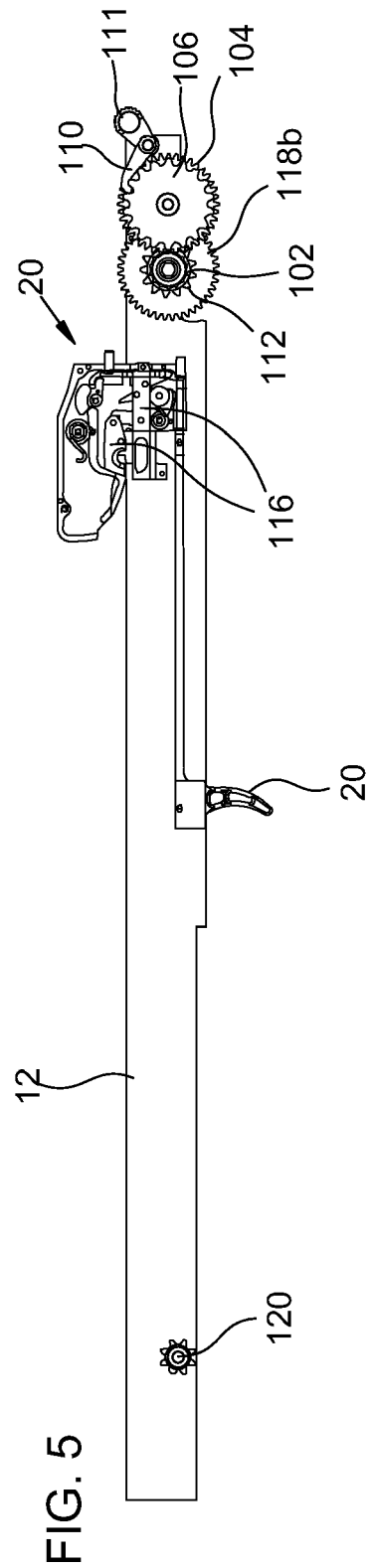
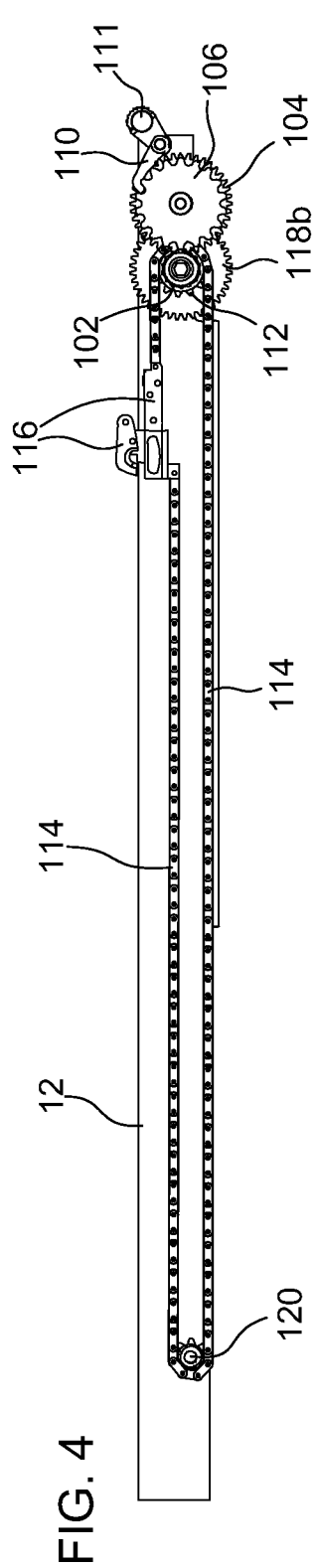
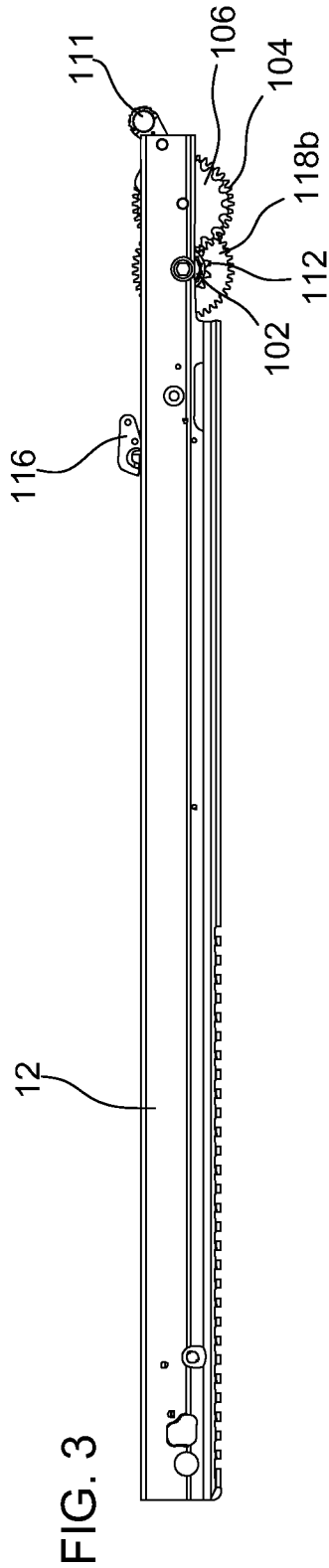


FIG. 2



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