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Declarations under Rule 4.17:
— as to the identity of the inventor (Rule 4.17(i))

(54) **Title:** HYDROGEN LIQUEFIER

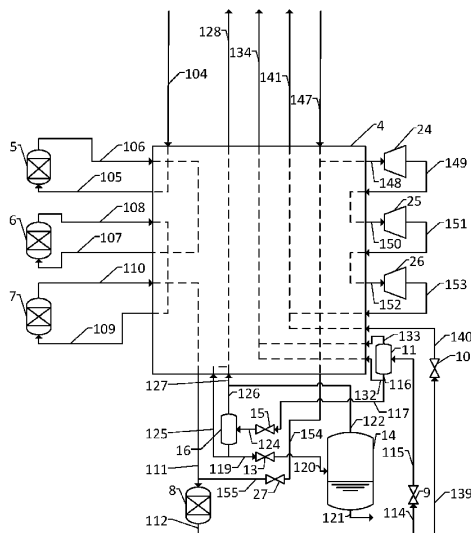


Fig. 1B

(57) **Abstract:** Hydrogen is liquefied through a process utilizing refrigeration from hydrogen at one, two, or three different pressures as well as a nitrogen refrigeration cycle. One or more stages of catalyst are used to convert ortho-hydrogen to para-hydrogen as the hydrogen is cooled and liquefied. Subcooled liquid hydrogen feeds the final stage of ortho-hydrogen to para-hydrogen conversion to reduce or eliminate vaporization of the hydrogen during the exothermic ortho-hydrogen to para-hydrogen conversion.

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