

(12) **UK Patent Application** (19) **GB** (11) **2479108** (13) **A**

(43) Date of Reproduction by UK Office **28.09.2011**

(21) Application No: **1113470.7**
(22) Date of Filing: **07.01.2010**
(30) Priority Data:
(31) **61204594** (32) **08.01.2009** (33) **US**
(86) International Application Data:
PCT/US2010/020393 En 07.01.2010
(87) International Publication Data:
WO2010/080929 En 15.07.2010

(51) INT CL:
H01P 1/213 (2006.01) **H01P 1/205** (2006.01)
(56) Documents Cited by ISA:
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(58) Field of Search by ISA:
INT CL **H01P**
Other: **EPO-Internal**

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(54) Title of the Invention: **Duplex filter with recessed top pattern and cavity**
Abstract Title: **Duplex filter with recessed top pattern and cavity**

(57) A duplex filter includes a core of dielectric material with top, bottom, and side surfaces, and first and second spaced-apart sets of through-holes extending therethrough. A wall extends outwardly from the top surface to define a peripheral rim and cavity. A pattern of metallized and unmetallized areas are defined on selected core surfaces including strips of metallization on top surface that extend onto the wall and the peripheral rim thereof to define respective transmit, receive, and antenna connection posts. In one embodiment, the core is made from two separate blocks which have been coupled together to define an interior metallized layer which separates the first and second sets of through-holes and an exterior wall on the top surface separates the respective transmit and receive conductive patterns thereon.

FIGURE 3

