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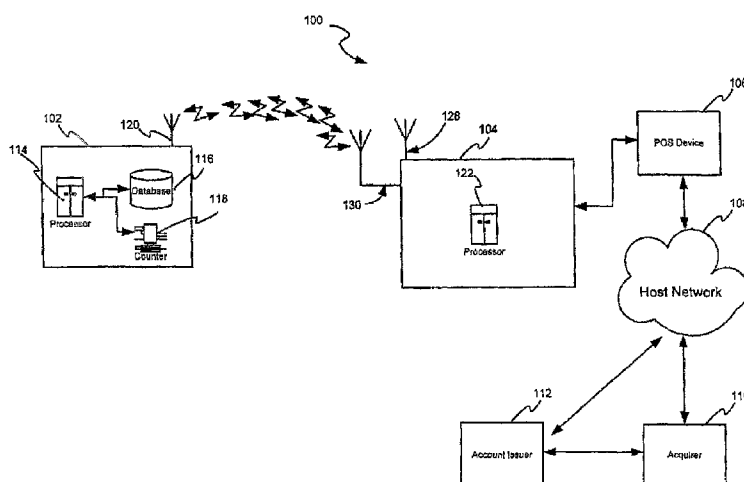
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(54) Title: SYSTEM AND METHOD FOR AUTHENTICATING A RF TRANSACTION USING A RADIO FREQUENCY IDENTIFICATION DEVICE INCLUDING A TRANSACTIONS COUNTER



(57) Abstract: A system and method for securing a Radio Frequency (RF) transaction (100) a RF identification device (RFID) transaction device (102) is provided. RFID transaction device (102) includes a transactions counter for tallying the number of transactions attempted or completed with the RFID transactions device. Counter (118) value is used to create a RFID device authentication tag for use in validating the RFID device. A RFID reader, (104) interacting with the RFID device, provides a random number to the RFID device which may be used in the RFID device authentication tag creation and validation. RFID reader may also use counter value and random number to create a RFID reader authentication key useful for validating RFID reader. RFID transaction device may include an encryption key for creating RFID transaction device authentication tag. Likewise, RFID reader may include a RFID reader encryption key for creating RFID reader authentication tag.

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