Claims

What Is Claimed Is:

1. A network node comprising:

a processor configured to:

determine a wireless transmit and receive unit (WTRU) is not configured to support route selection policy rules;

receive a first message, the first message comprising service parameters associated with the WTRU, the service parameters applying if the WTRU is registered in a first visited public land mobile network (VPLMN) and the service parameters for use in generating route selection policy rules for the WTRU;

on a condition that the WTRU is not configured to support route selection policy rules, send a second message, the second message indicating that the route selection policy rules are to be sent to the WTRU if the WTRU becomes registered in the first VPLMN;

receive a third message from a network function;

generate route selection policy rules applicable to the WTRU while the WTRU is located in the first VPLMN; and

on a condition that the third message indicates the WTRU is registered in the first VPLMN, send a fourth message to the WTRU, the fourth message comprising the generated route selection policy rules for the WTRU while in the first VPLMN.

2. The network node of claim 1, further comprising computing memory, the computing memory having stored therein a policy control function (PCF).

3. The network node of claim 2, wherein the PCF is a home PCF (H-PCF).

4. The network node of claim 1, wherein the processor configured to receive the first message is further configured to receive the first message from a user data repository (UDR).

5. The network node of claim 1, wherein the processor configured to receive the first message is further configured to receive the first message from a PCF.

6. The network node of claim 1, wherein the processor configured to determine the WTRU is not configured to support route selection policy rules is further configured to receive a message indicating the WTRU is not configured to support route selection policy rules.

7. The network node of claim 6,

wherein the message indicating the WTRU is not configured to support route selection policy rules comprises an information element indicating the WTRU is not configured to support route selection policy rules.

8. The network node of claim 6, wherein the processor configured to receive the message indicating the WTRU is not configured to support route selection policy rules is further configured to receive the message indicating the WTRU is not configured to support route selection policy rules from an access and mobility management function (AMF).

9. The network node of claim 6, wherein the processor configured to receive the message indicating the WTRU is not configured to support route selection policy rules is further configured to receive the message indicating the WTRU is not configured to support route selection policy rules from a UDR.

10. The network node of claim 1, wherein the processor configured to receive the third message is configured to receive the third message from an AMF.

11. The network node of claim 10,

wherein the processor is further configured to send a request to the AMF to receive notification that the WTRU has become registered in the first VPLMN; and

wherein the third message indicates the WTRU has become registered in the first VPLMN.

12. A method comprising:

a computing system determining a wireless transmit and receive unit (WTRU) is not configured to support route selection policy rules;

the computing system receiving a first message, the first message comprising service parameters associated with the WTRU, the service parameters applying if the WTRU is registered in a first visited public land mobile network (VPLMN) and the service parameters for use in generating route selection policy rules for the WTRU;

the computing system, on a condition that the WTRU is not configured to support route selection policy rules, sending a second message, the second message indicating that the route selection policy rules are to be sent to the WTRU if the WTRU becomes registered in the first VPLMN;

the computing system receiving a third message from a network function;

the computing system generating route selection policy rules applicable to the WTRU while the WTRU is located in the first VPLMN; and

the computing system, on a condition that the third message indicates the WTRU is registered in the first VPLMN, sending a fourth message to the WTRU, the fourth message comprising the generated route selection policy rules for the WTRU while in the first VPLMN.

13. The method of claim 12, wherein the computing system comprises a policy control function (PCF).

14. The method of claim 12, wherein receiving the first message further comprises receiving the first message from a user data repository (UDR).

15. The method of claim 12, wherein receiving the first message further comprises receiving the first message from a PCF.