

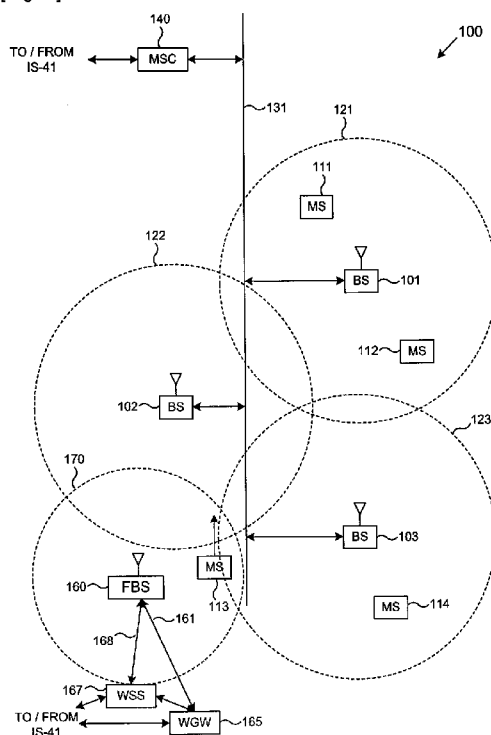


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| <p>(51) <b>International Patent Classification:</b><br/> <i>H04B 7/155</i> (2006.01)      <i>H04W 16/16</i> (2009.01)</p> <p>(21) <b>International Application Number:</b><br/> PCT/KR2010/007337</p> <p>(22) <b>International Filing Date:</b><br/> 25 October 2010 (25.10.2010)</p> <p>(25) <b>Filing Language:</b> English</p> <p>(26) <b>Publication Language:</b> English</p> <p>(30) <b>Priority Data:</b><br/> 12/589,714      26 October 2009 (26.10.2009)      US</p> <p>(71) <b>Applicant</b> (<i>for all designated States except US</i>): <b>SAM-SUNG ELECTRONICS CO., LTD.</b> [KR/KR]; 416, Maetan-dong, Yeongtong-gu, Suwon-si, Gyeonggi-do 442-742 (KR).</p> <p>(72) <b>Inventors:</b> <b>RAJASIMMAN, Vijayasimman</b>; 2317 Cup Drive, Plano, Collin County, TX 75074 (US). <b>JUBIN, John</b>; 431 Georgetown Drive, Richardson, Dallas Coun-</p> | <p>ty, TX 75081 (US). <b>THADASINA, Nivedan</b>; 1509 Arizona Drive, Allen, Collin County, TX 75013 (US).</p> <p>(74) <b>Agent:</b> <b>LEE, Keon-Joo</b>; Mihwa Bldg. 110-2, Myongryun-dong 4-ga, Chongro-gu, Seoul 110-524 (KR).</p> <p>(81) <b>Designated States</b> (<i>unless otherwise indicated, for every kind of national protection available</i>): AE, AG, AL, AM, AO, AT, AU, AZ, BA, BB, BG, BH, BR, BW, BY, BZ, CA, CH, CL, CN, CO, CR, CU, CZ, DE, DK, DM, DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LY, MA, MD, ME, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ, OM, PE, PG, PH, PL, PT, RO, RS, RU, SC, SD, SE, SG, SK, SL, SM, ST, SV, SY, TH, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW.</p> <p>(84) <b>Designated States</b> (<i>unless otherwise indicated, for every kind of regional protection available</i>): ARIPO (BW, GH, GM, KE, LR, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AL, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HR, HU, IE, IS, IT, LT, LU,</p> |
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*[Continued on next page]*

- (54) Title:** SYSTEM AND METHOD FOR SPECTRUM SPLIT FOR 1X AND HRPD OPERATIONS OF FEMTOCELL

[Fig. 1]



**(57) Abstract:** A femtocell management system determines a list of carriers available per a technology type, without operator action, on per county basis using the county carrier information, Macro database information and resource configuration table. The femtocell management system transmits the list of carriers available per a technology type to the femtocell base station and list of common carriers used by Macro base stations on a county level. The femtocell base station can receive this information and can select an operation carrier from the list of carriers available per a technology type on a county level. The femtocell base station also can use the list of carriers to determine locally available carriers. If no available carriers exist, the femtocell base station can select an operation carrier based on common carriers used by Overlay Macro base stations.



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**A. CLASSIFICATION OF SUBJECT MATTER*****H04B 7/155(2006.01)i, H04W 16/16(2009.01)i***

According to International Patent Classification (IPC) or to both national classification and IPC

**B. FIELDS SEARCHED**

Minimum documentation searched (classification system followed by classification symbols)

H04B 7/155; H04Q 7/20; H04W 72/00; H04L 12/56

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Korean utility models and applications for utility models

Japanese utility models and applications for utility models

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

eKOMPASS(KIPO internal) &amp; Keywords: femtocell, macrocell

**C. DOCUMENTS CONSIDERED TO BE RELEVANT**

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 2009-0221295 A1 (SAHIN, MUSTAFA EMIN et al.) 03 September 2009 See abstract; paragraphs [0010]-[0013], [0074]-[0077]; claims 1-6 and figure 1.	1-20
A	US 2007-0097983 A1 (NYLANDER, TOMAS et al.) 03 May 2007 See abstract; paragraphs [0026]-[0028], [0033], [0040]; claim 3 and figure 2.	1-20
A	US 2009-0061892 A1 (LEE, ANTHONY et al.) 05 March 2009 See abstract; paragraphs [0005]-[0010]; claim 5 and figure 6.	1-20



Further documents are listed in the continuation of Box C.



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Authorized officer

HONG, Kyoung Ah

Telephone No. 82-42-481-5668



**INTERNATIONAL SEARCH REPORT**

Information on patent family members

International application No.

**PCT/KR2010/007337**

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