The Wireless Network Infrastructure Ecosystem: 2016 – 2030 – Macrocell RAN, Small Cells, C-RAN, RRH, DAS, Carrier Wi-Fi, Mobile Core, Backhaul & Fronthaul

Description:

The term “Wireless Network Infrastructure” has conventionally been associated with macrocell RAN (Radio Access Network) and mobile core segments of mobile operator networks. However, the scope of the term is expanding as mobile operators increase their investments in Heterogeneous Network or HetNet infrastructure such as small cells, carrier Wi-Fi and DAS (Distributed Antenna Systems), to cope with increasing capacity and coverage requirements.

In addition, mobile operators are keen to shift towards a C-RAN (Centralized RAN) architecture, which centralizes baseband functionality to be shared across a large number of distributed radio nodes. In comparison to standalone clusters of base stations, C-RAN provides significant performance and economic benefits such as baseband pooling, enhanced coordination between cells, virtualization, network extensibility and energy efficiency.

Due to a decline in macrocell RAN infrastructure spending, the report estimates that the wireless network infrastructure market will remain relatively flat through 2020, with annual investments of over $61 Billion. We also expect a significant shift in investments towards small cells, C-RAN, DAS and carrier Wi-Fi infrastructure. By 2020, these four submarkets, together with their fronthaul and backhaul segments, will account for over 50% of all wireless network infrastructure spending.


The report comes with an associated Excel datasheet suite covering quantitative data from all numeric forecasts presented in the report.

Key Findings

The report has the following key findings:

- Due to a decline in macrocell RAN infrastructure spending, the report predicts that the wireless network infrastructure market will remain relatively flat through 2020, with annual investments of over $61 Billion.
- The report predicts a significant shift in investments towards small cells, C-RAN, DAS and carrier Wi-Fi infrastructure. By 2020, these four submarkets, together with their fronthaul and backhaul segments, will account for over 50% of all wireless network infrastructure spending.
- Small cell and C-RAN solutions are beginning to converge as small cell OEMs seek to capitalize on the benefits of centralized coordination for in-building and enterprise coverage.
- Driven by ongoing large scale deployments, we estimate that LTE networks will generate nearly $800 Billion in annual service revenue by 2020.
- Vendors are increasing their focus on profit margins. Many are already cutting staff, embracing operational excellence, evolving their new business models, acquiring niche businesses and expanding their managed services offerings.
- New CapEx commitment avenues such as HetNet infrastructure and virtualization will continue to usher industry restructuring, and market consolidation.

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9.3 Fujitsu
9.4 Hitachi
9.5 Huawei
9.6 NEC Corporation
9.7 Nokia Networks & Alcatel-Lucent
9.8 Samsung Electronics
9.9 ZTE

10 Macrocell RAN, Small Cell, C-RAN & Mobile Core Specialists
10.1 Accelleran
10.2 Adax
10.3 ADB
10.4 Affirmed Networks
10.5 Airspan Networks
10.6 Alpha Networks
10.7 Altiostar Networks
10.8 Arcadyan Technology Corporation
10.9 Argela
10.10 ARItel
10.11 Artemis Networks
10.12 Askey Computer Corporation
10.13 ASOCS
10.14 Athonet
10.15 Athena Wireless Communications (Google)
10.16 Axxcelera Broadband Wireless (Moseley Associates)
10.17 Brocade Communications Systems
10.18 Casa Systems
10.19 CCI (Competitive Companies, Inc.)
10.20 Contela
10.21 CS Corporation
10.22 Datang Mobile
10.23 Dongwon T&I
10.24 Femtel (Suzhou Femtel Communications)
10.25 Gemtek Technology Company
10.26 GENBAND
10.27 GWT (Global Wireless Technologies)
10.28 HP (Hewlett-Packard)
10.29 ip.access
10.30 Juni Global
10.31 Juniper Networks
10.32 Lemko
10.33 LGS Innovations
10.34 Mitel Networks Corporation
10.35 New Postcom Equipment Company
10.36 NewNet Communication Technologies
10.37 Nutaq
10.38 Oceus Networks
10.39 Panda Electronics (Nanjing Panda Electronics Company)
10.40 Parallel Wireless
10.41 Polaris Networks
10.42 Potevio (China Potevio Company)
10.43 Quanta Computer
10.44 Quell
10.45 Quortus
10.46 Redline Communications
10.47 Sagemcom
10.48 Samji Electronics Company
10.49 SerComm Corporation
10.50 SK Telesys
10.51 SpiderCloud Wireless
10.52 Star Solutions
10.53 Sunnada (Fujian Sunnada Communication Company)
10.54 Taqua
10.55 Tecom
10.56 TEKTELIC Communications
10.57 Telum
10.58 Telrad Networks
10.59 WNC (Wistron NeWeb Corporation)
10.60 Z-Com (ZDC Wireless)

11 Antenna, DAS & Repeater Solution Specialists
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11.2 ADRF (Advanced RF Technologies)
11.3 Affarii Technologies
11.4 American Tower Corporation
11.5 Arqiva
11.6 Axis Teknologies
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11.10 CCI (Crown Castle International)
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11.32 Nexius
11.33 Nextivity
11.34 RF Window
11.35 RFS (Radio Frequency Systems)
11.36 Rosenberger
11.37 SOLiD (SOLiD Technologies)
11.38 Sumitomo Electric Industries
11.39 Sunwave Communications
11.40 TESSCO Technologies
11.41 Westell Technologies
11.42 Zinwave

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12.4 Aerohive Networks
12.5 Alvarion Technologies
12.6 Aptilo Networks
12.7 Aruba Networks
12.8 Autelan
12.9 BandwidthX
12.10 Birdstep Technology
12.11 Browan Communications
12.12 BSG Wireless
12.13 D-Link Corporation
12.14 Edgewater Wireless Systems
12.15 EION Wireless
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12.17 Fortinet
12.18 Front Porch
12.19 GoNet Systems
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12.21 Meru Networks
12.22 Netgem
12.23 NETGEAR
12.24 Nomadix
12.25 Panasonic Corporation
12.26 Ro-Timak Technology
12.27 Ruckus Wireless
12.28 Senao Networks
12.29 Smith Micro Software
12.30 SpectrumMax
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12.32 TP-LINK Technologies
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14.71 Positron
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14.74 RAD Data Communications
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14.76 SAF Tehnika
14.77 SIAE Microelectronics (SIAE Microelectronica)
14.78 Siklu
14.79 SkyFiber
14.80 SMC Networks
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14.82 Star Microwave
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14.85 Tellion
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