E16/E24 nano3G®
3G Enterprise Access Point for enterprise and public spaces

The E16 and E24 nano3G Access Points (APs) generate a high quality UMTS signal inside small offices, shops, homes and public spaces

The E-class Access Points
The E16 and E24 APs support 16 and 24 simultaneous active users respectively for voice and data. A full +24dBm (250mW) of transmit power and HSPA+ at 21/5.75 Mbps make the E-class range of APs extremely effective for medium and large in-building deployments.

Full mobility is provided with configurable Open or Closed Access, bi-directional handover (i.e. both hand-out and hand-in) to 2G, 3G and 4G macro networks, and support for the 3GPP Rel 9 Iuh femtocell standard.

The E-class APs also feature integrated Power over Ethernet (PoE+) to simplify cabling in complex sites by removing the need for power to be available where the AP is deployed. They have removable antennae with SMA connectors to enable connectivity into external antennas or DAS.

The E-class APs include a high performance oscillator to deliver excellent frequency stability, ensuring picocell class timing, synchronisation and optimised startup time.

Easy deployment
The E-class APs offer a flexible commissioning capability enabling a choice of approaches to suit any type or scale of deployment.

Easy installation combined with fast commissioning and AP startup times mean that sites can be brought into service quickly and efficiently.

Viper™ virtualised enterprise RAN platform
The E-class APs are part of ip.access’ Viper end-to-end small cell platform for enterprise RAN, which integrates the following components:

— A range of plug-and-play 2G, 3G and 4G APs for small, medium and large enterprise deployments
— Virtualised Gateways which securely handle and route all traffic between the APs and the operator’s core network
ip.access provides a complete end-to-end solution that integrates with your core network and provides mobile service quickly. The result is high speed data rates and excellent quality voice for your indoor users, and dramatically improved capacity for those using the macro network outside as well.

### nano3G E-class Access Points

**E-class small cells**
- Simultaneous data and voice users: 16 or 24
- RF Output Power: +24dBm (250mW) (+13dBm for Band 5)
- UMTS bands: 1, 2/5
- External antennas option
- OCXO for high stability internal frequency
- NTP for time stamp for certificate validation
- Open/closed access modes

**Network Listen**
- 3G & 2G Network listen to support radio synchronisation and RF planning

**Security**
- 3GPP air interface security
- IPsec IKEv2 on AP-SeGW links
- X.509 certificate authentication with CRL

**Interfaces**
- Iuh interface to AC
- Uu air interface to standard 3G UEs

**UTRAN mobility**
- Reselection & handover to/from macro layer
- Reselection & handover between APs
- Intra-frequency, Inter-frequency, Inter-RAT

**Environmental & physical**
- Dimensions: 274 x 211 x 58.6mm
- Weight: 1.75kg including bracket
- Temperature range: 0° to 45°C
- Operating humidity: 10 to 70% non-condensing
- Ingress protection: IP40
- Mounting: Wall mounted
- Power input: 12V DC or POE+
- Power usage: < 18W

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![Viper™ end-to-end small cell platform](image-url)

**Small Cells**
- nanoLTE E-Class APs
- nanoLTE S-Class APs
- nano3G E-Class APs
- nano3G S-Class APs
- Enterprise nanoBTSs

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![Diagram](image-url)