6th NATIONAL ICT SUMMIT
Venue: NIPAM, Windhoek, Namibia
7th – 9th October 2019
Theme: “Accelerating Digital Transformation”

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Optus La Trobe Cyber Security Research Hub

Day 1, Plenary Speech at 12:20-12:55, Monday, 7 October 2019
Making Digital Transformation Work for the People

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- digitization
  - technical conversion
- digitalization
  - business process
- digital transformation
  - effect
agriculture, forestry and fishing sector 46,752

401,970 employees

the wholesale and retail trade 53,779
41.6 percent of households depend on subsistence farming.

Arable land = 1% of Namibia.
GROWAS II Modules
Daily Water Consumption - Boundary Road PRV High Pressure & Low Pressure

- **High Pressure (bar):** 9.14
- **Average High Pressure:** 5
- **MAX High Pressure:** 10.8
- **Low Pressure (bar):** 4.3
- **Average Low Pressure:** 2.4
- **MIN Low Pressure:** 2.2

Daily Water Consumption - Boundary Road PRV

- **Flow (l/min):** 12281.25
- **Average Flow:** 12112.6
- **MAX Flow:** 21683.3
- **Daily Usage:** 8424.8
- **Average Daily Use:** 14739.8
- **Total Use for Period:** 103179
310,854 (35.4%) employed

876,908 youth aged 15 to 34

265,770 (30.3%) unemployed

1 : 1
## Beyond IP Traffic Classification: Metadata Extraction from Network Traffic

**Qosmos ixEngine®** extracts 8 main categories of network-based application metadata and computed metadata:

- **Volume**: e.g. the volume of traffic per application and per user, size of a web page including all its components.
- **Application usage**: e.g. HTTP URL or name of video played in YouTube. Qosmos delivers 5000 application metadata to enable smarter decisions based on full understanding of user behavior.
- **Service identification**: e.g. audio, video, chat, file transfer for most popular VoIP and IM applications.
- **Application performance**: e.g. delay and jitter / application / user.
- **Identifiers**: e.g. email sender / receiver addresses or any other ID that can be used to implement strong security rules.
- **Content**: e.g. attached file within an email, which can be directed to specific processing like anti-virus or content inspection.
- **File metadata**: such as codec and bit rate used in a Flash video. These can be used for customer experience management, network security, etc.
- **Security related metadata**: e.g. tunneling on protocols such as dns or icmp.

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### Qosmos ixEngine®

The Greek philosopher Plato, Socratic dialogue, Republic:

"The true creator is necessity, who is the mother of our invention."
Thank you

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