It should be noted that Nokia and its business are exposed to various risks and uncertainties and certain statements herein that are not historical facts are forward-looking statements. These forward-looking statements reflect Nokia’s current expectations and views of future developments and include statements preceded by "believe", "expect", "expectations", "commit", "anticipate", "foresee", "see", "target", "estimate", "designed", "aim", "plan", "intend", "influence", "assumption", "focus", "continue", "project", "should", "is to", "will" or similar expressions. These statements are based on management’s best assumptions and beliefs in the light of the information currently available to it. Because they involve risks and uncertainties, actual results may differ materially from the results that we currently expect. Factors, including risks and uncertainties that could cause such differences can be both external, such as general, economic and industry conditions, as well as internal operating factors. We have identified these in more detail in our annual report on Form 20-F for the year ended December 31, 2021, under "Operating and Financial Review and Prospects—Risk Factors", and in our other filings or documents furnished with the U.S. Securities and Exchange Commission, including Nokia’s financial results reports. Other unknown or unpredictable factors or underlying assumptions subsequently proven to be incorrect could cause actual results to differ materially from those in the forward-looking statements. We do not undertake any obligation to publicly update or revise forward-looking statements, whether as a result of new information, future events or otherwise, except to the extent legally required.

Nokia presents financial information on reported, comparable and constant currency basis. Comparable measures presented in this document exclude intangible asset amortization and other purchase price fair value adjustments, goodwill impairments, restructuring related charges and certain other items affecting comparability. In order to allow full visibility on determining comparable results, information on items affecting comparability is presented separately for each of the components of profit or loss. Constant currency reporting provides additional information on change in financial measures on a constant currency basis in order to better reflect the underlying business performance. Therefore, change in financial measures at constant currency excludes the impact of changes in exchange rates in comparison to euro, our reporting currency. As comparable or constant currency financial measures are not defined in IFRS they may not be directly comparable with similarly titled measures used by other companies, including those in the same industry. The primary rationale for presenting these measures is that the management uses these measures in assessing the financial performance of Nokia and believes that these measures provide meaningful supplemental information on the underlying business performance of Nokia. These financial measures should not be considered in isolation from, or as a substitute for, financial information presented in compliance with IFRS.

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Good profitability supports full year outlook

Q2 22 net sales
+3% (year-on-year at constant currency)

Q2 22 gross margin
40.6% (comparable)

Q2 22 operating margin
12.2% (comparable)
Mobile Networks

Net sales: +1%
Op. margin: 11.2%

Returned to growth despite COVID-19 related lockdowns and wider component constraints

Continued operating margin improvement

Expect sales growth in 2022 at constant currency

Network Infrastructure

Net sales: +12%
Op. margin: 11.5%

Strong end-market demand

Growth in all four businesses with Submarine Networks and Fixed Networks showing double-digit growth

Operating margin expanded 240bps

All net sales changes presented are year-on-year in constant currency.
Cloud & Network Services

Net sales flat with offsetting performance within businesses

Gross margin improvement by 150bps

Investments in private wireless

Nokia Technologies

Net sales -25%
Op. margin 71.1%

Timing effect from contract renewals

Prioritizing protecting value of IP over achieving timelines

Confident in ability to return to EUR 1.4 to 1.5bn range

All net sales changes presented are year-on-year in constant currency
Enterprise returned to net sales growth

- Growth despite some supply chain headwinds
- Continue to see strong order intake
- Confident in delivering accelerating growth in H2
- Continue to grow customer base
- Investing to build on early market leadership in private wireless
Resilience in an uncertain macroeconomic environment

**Macroeconomic uncertainty**

- Industry benefiting from structural technology investments
- No major changes to demand outlook
- Currency fluctuations in emerging markets could impact customer affordability

**Supply chain**

- Challenging situation continues although seeing signs of easing through H2 22 and H1 23
- Some supplier specific challenges remain

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**Fiber penetration rates globally (ex. China)**

<table>
<thead>
<tr>
<th>Region</th>
<th>Homes connected</th>
<th>Homes passed</th>
</tr>
</thead>
<tbody>
<tr>
<td>MEA</td>
<td>0%</td>
<td>0%</td>
</tr>
<tr>
<td>NAM</td>
<td>20%</td>
<td>20%</td>
</tr>
<tr>
<td>LAT</td>
<td>40%</td>
<td>40%</td>
</tr>
<tr>
<td>Europe</td>
<td>60%</td>
<td>60%</td>
</tr>
<tr>
<td>APAC ex. China</td>
<td>80%</td>
<td>80%</td>
</tr>
</tbody>
</table>

Source: Internal estimates

---

**Global 5G site penetration (ex. China)**

\[ \sim 15\% \]

Source: Internal estimates
CFO remarks

10. Financial performance bridges
12. Cash flow performance
13. 2022 TAM and outlook
North America growth, Europe impacted by Nokia Technologies

Year-on-year at constant currency (regions excluding Submarine Networks)

+11% reported growth
+3% constant currency growth

Q2 2021

North America: +19%
Middle East & Africa: +15%
Greater China: +5%
Latin America: +5%
Asia Pacific: -3%
India: -25%
Europe: -14%
Submarine Networks: +27%
FX impact

Q2 2022

€5.3bn
€5.8bn

PUBLIC

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Continued progress in MN and NI offset by Technologies

Group comparable operating profit

- Q2 2021: €682mn, 12.8%
- Q2 2022: €714mn, 12.2%

Margin expansion in both NI and MN
Timing of Nokia Technologies renewals impacting mix
Venture fund benefited Group Common
Cash flow impacted by employee variable pay and inventories

Free cash flow negative EUR 0.1bn

Net working capital impacted by outflows related to employee variable pay, within liabilities, and increased inventories
## Market growth in 2022 updated

<table>
<thead>
<tr>
<th></th>
<th>Estimated, in €</th>
<th>2022</th>
<th>YoY (at const. ccy)</th>
<th>YoY prior est. (at const. ccy)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Mobile Networks</strong>¹</td>
<td>51bn</td>
<td>+5%</td>
<td></td>
<td>+4%</td>
</tr>
<tr>
<td><strong>Network Infrastructure</strong>²</td>
<td>47bn</td>
<td>+5%</td>
<td></td>
<td>+3%</td>
</tr>
<tr>
<td><strong>Cloud and Network Services</strong></td>
<td>27bn</td>
<td>+3%</td>
<td></td>
<td>+4%</td>
</tr>
<tr>
<td><strong>Total addressable market</strong>¹²</td>
<td>125bn</td>
<td>+4%</td>
<td></td>
<td>+4%</td>
</tr>
</tbody>
</table>

¹ Excluding China for Mobile Networks  
² Excluding Submarine Networks  

Market size calculated assuming the rate 1 EUR = 1.04 USD as of 30 June 2022 continues for the remainder of 2022 along with year-to-date actual foreign exchange rate.
**2022 net sales outlook unchanged in constant currency**

<table>
<thead>
<tr>
<th></th>
<th>Full year 2022</th>
</tr>
</thead>
<tbody>
<tr>
<td>Net sales(^1)</td>
<td>€23.5 billion to €24.7 billion (constant currency unchanged)</td>
</tr>
<tr>
<td>Comparable operating margin</td>
<td>11 to 13.5%</td>
</tr>
<tr>
<td>Free cash flow</td>
<td>25–55% conversion from comparable operating profit</td>
</tr>
</tbody>
</table>

\(^1\)Assuming the rate 1 EUR = 1.04 USD as of 30 June 2022 continues for the remainder of 2022 along with year-to-date actual foreign exchange rates (adjusted from prior EUR 1.11 rate as of 31 Mar 2022). Assuming the year-end 2021 exchange rate, the net sales outlook would continue to be EUR €22.6bn to EUR 23.8bn. Please see our Report for Q4 and full year 2021 for a full explanation of the terms used and the assumptions embedded in our financial outlook.
High level of natural hedging inherent in the business

**Currency exposure (Q2'22)**

- **EUR**: 20% Net sales, 25% Total Costs
- **USD**: 55% Net sales, 50% Total Costs
- **CNY**: 5% Net sales, 5% Total Costs
- **Other**: 20% Net sales, 20% Total Costs

**Rule of thumb**

- **Change in EUR/USD:** 10% stronger USD
- **Net sales impact:** +5%
- **Operating margin impact before hedging:** Slight positive
- **Operating profit after hedging:** Neutral
- **Operating margin after hedging:** Slight negative
Strong underlying improvements somewhat offset by inflation

Comparable operating margin drivers in 2022

- 2021: 12.5%
- One-offs: 1.5%
- 2021 ex. one-offs: 11.0%
- Cost inflation / investments
- Sales growth
- Operational improvements: 13.5%
- 2022: 11.0%
Q&A
## Strategic Priorities by Business Group in 2022

**Driving the business towards technology leadership**

<table>
<thead>
<tr>
<th>Business Group</th>
<th>Strategic Priorities for 2022</th>
</tr>
</thead>
</table>
| Mobile Networks              | **Defend and build scale** – Capitalise on renewed product competitiveness to gain share  
|                              | **Increase product development capacity and competitiveness** – Continue to invest to build technology leadership while also improving efficiency (more output per unit of input)                                                |
| Network Infrastructure       | **Extend product leadership** with focused R&D investment in strategic growth areas through next generation network processor, DSPs, software and network automation  
|                              | **Continue growth into the non-CSP market** by expanding in key select Enterprise verticals and webscale                                                                                                                    |
| Cloud and Network Services   | **Grow in emerging** – Accelerate and scale the emerging portfolios and transition to SaaS  
|                              | **Private wireless investment** – Investments in private wireless and the industrial edge ecosystem                                                                                                                       |
| Nokia Technologies           | **Renewals/new areas** – Deliver on contract renewals and continue traction in new areas (auto / IoT / CE)  
|                              | **Technology investment** – Continue investing in technology leadership, standards leadership and patent fillings to ensure continued longevity of our portfolio                                                                |
Long-term targets for the business
We aim to deliver continuous improvement each year

<table>
<thead>
<tr>
<th>Target model</th>
<th>Factors to deliver the model</th>
</tr>
</thead>
<tbody>
<tr>
<td>Revenue growth</td>
<td>MN – Renewed competitiveness and market dynamics provide share gain opportunities</td>
</tr>
<tr>
<td></td>
<td>NI – Strengthening technology leadership to enable continued outperformance</td>
</tr>
<tr>
<td>Grow faster than the market</td>
<td>CNS – Rebalancing portfolio towards faster growing portions of the market</td>
</tr>
<tr>
<td>Comparable operating margin</td>
<td>Enterprise – Capitalise on early leadership to benefit from faster enterprise growth than CSP</td>
</tr>
<tr>
<td>≥14%</td>
<td>Market growth – Market has been strong in 2021 – key factor on time taken to deliver model</td>
</tr>
<tr>
<td>Free cash flow</td>
<td>Relative scale – As we gain market share, improved scale is key to delivering margins</td>
</tr>
<tr>
<td>55-85% conversion from comparable operating profit</td>
<td>Product competitiveness – Continue to invest for technology leadership</td>
</tr>
<tr>
<td></td>
<td>Efficient cost base – Investment in R&amp;D critical to long-term but efficiency/productivity key</td>
</tr>
<tr>
<td></td>
<td>TECH – Assuming largely stable operating profit in Tech longer-term</td>
</tr>
</tbody>
</table>

- Working capital efficiency – Remain focused on cash conversion in BGs there will be yearly volatility but we expect to be more limited over the longer-term.
- Lower restructuring – Smaller normal adjustment to secure we have the right skills.
- TECH cash conversion – Cash conversion to normalise over time.
## Accelerate and Scale

### 2022 and mid term

<table>
<thead>
<tr>
<th>Grow</th>
<th>Invest</th>
<th>Optimize</th>
<th>Innovate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Capitalize on renewed MN portfolio to gain share</td>
<td>Prioritise R&amp;D towards technology leadership</td>
<td>Improve R&amp;D efficiency and digitize processes</td>
<td>New business models, strategic partnerships, enterprise expansion</td>
</tr>
<tr>
<td>Benefit from technology leadership in NI. Growth in CNS emerging areas.</td>
<td>Drive standard setting</td>
<td>Continuous review of business returns to optimise portfolio</td>
<td>Transition to SaaS</td>
</tr>
<tr>
<td>Grow beyond CSP</td>
<td>Capitalise on private wireless leadership</td>
<td>Refocusing R&amp;D in CNS towards growth areas</td>
<td>Utilise long-term innovation capacity incl. Bell Labs / NGP Capital</td>
</tr>
</tbody>
</table>

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