Public Solutions Business

Chikara Nakamata, Executive Vice President
NEC creates the social values of safety, security, fairness and efficiency to promote a more sustainable world where everyone has the chance to reach their full potential.
Public Solutions Business Domain

Provide solutions for local government, healthcare organizations, transportation company, electric power company, and local private enterprise.
Vision of the Public Solutions Business

Major Issues for BU to Focus
- Reduction of social security spending
- Responses to labor shortages
- Efforts to enhance regional activity

SDGs

NEC Safer Cities

Digital Healthcare

Digital Government

City Management

Data Coordination Platform

Digitalization

Data Coordination Platform

Cloud AI IoT Cyber Security

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R&D

Computing

Network

Healthcare organization

National / Local Government

Electronic / Transportation

Private Company

- Electronic medical record system
- Collaboration with Local healthcare
- Pathological image analysis
- Resident Information
- Resident infra NW
- MyNumber infra
- Fire department system/wireless
- Disaster prevention system/information
- Firefighting/rescue cloud
- Disaster detection
- Traffic Control
- ETC
- Railway Wireless
- Railway NW
- Sales management
- Inventory management
- Accounting
- Salary
- Member management

Healthcare organization

National / Local Government

Electronic / Transportation

Private Company

Sensing

Computing

Network
Achievements and Targets for the FY20 mid-term plan

In order to achieve the FY20 mid-term plan, aim to further improve earnings while maintaining revenue (excluding special demands for PC); at the same time, prepare for the next growth strategy.

### Year of Gear Change
- End of nomination stop*
- Complete structural reform
  * Ex: Firefighting digital case

### Turnaround Year
- Revert to normal operations
- Establish stable business foundation

### Year on the Offensive
- Achieve FY20 mid-term plan
- Prepare for post-FY20 growth strategy

### Adjusted Operating Margin
- FY18 (Actual): 3%
- FY19 (Actual): 7%
- FY20 (Forecast): 9%

### Revenue
- FY18 (Actual): ¥4,093
- FY19 (Actual): ¥4,784
- FY20 (Forecast): ¥4,500

※CAGR 5% Growth (FY18→FY20)

*Special demand for PC*
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1. FY19 Results

2. FY20 Outlook

3. Mid-to-long term Management Challenges and Countermeasures
1. FY19 Results
Achieved significant GP improvements through revenue increase and profit-enhancing initiatives

**Revenue (YoY)**

- **FY18 Adjusted Operating Profit**: 138
- **TY19 Adjusted Operating Profit**: 342

**Revenue Increase**

- **Impact of FY19 Structural Reform**: +161
- **Profit-enhancing Initiatives**: +56
- **Special Demand for PO**: +39

**SW Asset Depreciation**

- **(36)**

**Typhoon Damages**

- **(10)**

**Accelerated Investments in Technological Development**

- **10**

**Revenue (¥100mn)**

- **4,093**
- **4,784 (+9%)**
Summary of Business in FY19

Key Achievements

(1) **Initiatives for the FY20 mid-term plan**
- Acceleration of technology development investments
- Cleanup of assets

(2) **Topline growth**
- Steady growth in core businesses
- Special demand for PC

(3) **Execution of Profit-enhancing initiatives**
- Quality improvement activities across Business Unit

Growth rate of individual businesses:
- Public (Nation, law amendment etc.) 205%
- Medical (Electronic medical records etc.) 114%
- Local Private enterprise (core systems etc.) 119%
Execution of Profit-enhancing initiatives

Multi-tiered Strengthening of Quality Measures

Dedicated quality team performs:
(1) Check of entire processes
(2) Expansion of processes to small-sized projects

Executives across BU performs:
(3) Mutual check of key projects

Dedicated technical team performs:
(4) Cross-sectional architecture control

Aimed at launch of new businesses:
(5) Streamlining of processes focusing on new projects (preparation)

FY20 Initiatives

Pre-order phase
- Risk assessment meeting
- Pre-order review meeting

Development phase
- Planning review
- Process review

Shipment phase
- Product release decision

Quality development in upstream processes

Multi-tiered Strengthening of Quality Measures
2. FY20 Outlook
Continuing earnings enhancement initiatives are expected to contribute to increasing profit. Adapting to COVID-19 & accelerate digital transformation in the Public Solutions Business.
Focus Initiatives in FY20

(1) **Earnings enhancement initiatives**
   - Earnings improvement through quality improvement activities across BU
   - Improve efficiency and reduce cost by supply chain reform
   - Strengthen management with focus on profitability

(2) **Adapting to COVID-19**
   - Respond to demands for New Normal solution

(3) **DX of the Public Solutions Business**
   - Digital Government
   - Digital Healthcare
   - City Management/Public Safety
COVID-19 Impact and Outlook

Impact on Q1 Performance
- Limited impact on revenue and profit as of Q1
- Decrease in orders mainly from healthcare and local private enterprise sector

FY20 Outlook
- Potential deferral of investments in healthcare, transportation, and local private enterprise sectors due to continuous impacts of COVID-19
- Increase in demands for New Normal solutions

Countermeasures
- Win business relating to “Remote and Touchless”, “Work at Home”, and “Management efficiency (DX)”
- Obtain revised budget*
- Maintain profitability by strengthening cost management

* Non-recurring regional revitalization subsidies for COVID-19 / COVID-19 emergency comprehensive benefits
Leveraging “Remote and Touchless” technology to provide safety and protect healthcare organizations from COVID-19

Remote and Touchless Solutions for Medical Institutions

**Electronic Medical Record System**

- **Face Recognition/Reception for Revisits**
  - [Launched]
  - Touchless
  - Remote

- **Login by Face Recognition**
  - Touchless
  - [Launched]

- **Fever Screening**
  - Touchless
  - Remote
  - [Proof of Concept]

- **Entrance/Exit Management by Face Recognition**
  - Touchless
  - [Launched]

- **Remote Voice Recording Support**
  - Touchless
  - [Proof of Concept]
  - Voice recording and textualization of nursing records/reports, etc.

- **Online Medical Services**
  - Touchless
  - Remote
  - [Planning Phase]
  - Online medical services for hospitals
  - Coordination between clinics and recovery phase hospitals

- **Remote Conferences**
  - Touchless
  - Remote
  - [Planning Phase]

- **AI Chatbot**
  - Remote
  - [Launched]

- **Recording of Dialogue**
  - Touchless
  - [Launched]

**Objective:**
Prevent in-facility infection and spread

- **Objective:**
  - Face recognition + body surface temperature measurements with thermal cameras

- **Objective:**
  - Rapid, high-precision automatic responses to inquiries using AI

- **Objective:**
  - Dialogue recording in telemedicine

- **Objective:**
  - In-hospital remote care
  - In-hospital remote conferences
  - Remote medical diagnosis support

**Case:** Remote and Touchless Solutions for Medical Institution

(2) Adapting to COVID-19
# Digitalization of Administrative Services

<table>
<thead>
<tr>
<th>Customer Needs</th>
<th>“Cloud by Default”</th>
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</table>
| - Enhance usability of application Procedures  
- Improve productivity in public and private sector | - Reduce workload of administration  
- Enhance service levels |

## Basic Strategy

### Expertise x Biometric Recognition
- Information linkage to My Number system base (expertise in establishing government systems)
- Biometric Recognition technology

### In-house Technology x Partnership
- Hybrid cloud through business collaboration depending on application and purpose
- Cyber security technology

## Rule-Making
Inception planning toward planning of administrative services and regulatory reform from users’ standpoint and by service design thinking.
- No need to manage passwords, significantly enhance user experience and prevent fraudulent use

- Expand possibilities of MyNumber use
- No need for paper filings, significantly enhancing user experience
<Digital Healthcare> Future Proposal for Medical institutions

**Visiting**

~Mitigate risks beforehand~
Check beforehand the body surface temperatures of patients and workers, manage workers’ physical condition based on working time

- Face recognition gate
- Thermo gate
- Fever screening
- Stress analysis

**In Hospital**

~No touch, No wait, No gather~

**Guidance**
Support international people with signage display and apps

**Treatment, Hospitalization, Nursing**
Support touchless usage and input of medical record, support for remote medical treatment

- Reception by face recognition
- Voice record AI
- Electronic medical record
- Online medical treatment
- Face recognition login
- AI chat bot + Apps
- Remote conference
- Payment SL
- Sharing medical record
- SL supporting medical drugs

**After Treatment / At home**

~Information sharing for safety~
Share medical history across institutions when necessary, follow after discharge from hospital

- AR, VR
- Online medical treatment

*Includes “proof of concept” and “planning phase”*
Area Disaster Prevention - Takamatsu to neighboring local governments -

Integrate disaster prevention data with data connectivity, supporting decision making through comprehensive situation analysis.

Shared use of data connection platform link to neighboring local governments.

Various critical data are displayed on the Shared Screen -> Real-time Situational Recognition.
3. Mid-to-long term Management Challenges and Countermeasures
Mid-to-long term Goals

Realization of “Portfolio Transformation” of the Public Solutions Business

Acceleration of Digitalization due to COVID-19

Creating New Value

Add-Value

Existing Business

Now

Timeline
### Key Management Challenges

<table>
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<tr>
<th>Challenge</th>
<th>Countermeasures</th>
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<tbody>
<tr>
<td>Portfolio Transformation</td>
<td>- Launch new businesses in a short run &amp; establish them as profitable businesses</td>
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<tr>
<td>Establish business structure in response to DX demands</td>
<td>- Establish data sharing infrastructure</td>
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<tr>
<td></td>
<td>- Train and acquire DX specialists (including external resources)</td>
</tr>
<tr>
<td>Strengthen sales force</td>
<td>- Integrated management with business department</td>
</tr>
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<td>- Establish hybrid sales force (Integration of Digital x Real)</td>
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**Realization of NEC Safer Cities**
Chapter 3: Realization of "New Normal"
1. Establishment of environment and focused investment and implementation for digitalization to drive the creation of the "New Normal" (Digital New Deal)
(1) Powerful promotion of next-generation administrative services: Spanning of digital government
2. Regional revitalization realizing the "New Normal"
(1) From Tokyo-centric approach to multi-hub nation building
1) Acceleration of social implementation of smart cities

"Data Health Reform Promotion Plan"

1. Summary
As Japan engages in resolving the issues of a super-aging society ahead of the rest of the world, it will be necessary to consider "a vision for the country concerning health, medical and nursing care" and identify "services truly required by patients and the people. "In addition, based on such a philosophy and vision, we must organize and thoroughly collect and analyze the enormous volume of data on health, medical, and nursing care, rebuild ICT infrastructure to shift the perception of utilization of ICT from health, healthcare and nursing care from a supplier perspective to a the perspective of patients, people and users, and realize a paradigm shift in health, medical and nursing care policy.
Summary

**Business Positioning**
Support social infrastructure and contribute to regional sustainable growth

**FY19 Results**
Realize profit growth through topline revenue expansion and execution of measures to improve profitability

**FY20 Initiatives**
Achieve target profit by continuing & strengthening measures to improve profitability and assessment of / recovery from the impact of COVID-19

**Future Market Trends**
Acceleration of digitalization as a result of the COVID-19 crisis

**Mid-term Business Goal**
Immediate launch of new business domains and establish business structure to secure stable profit
Orchestrating a brighter world

NEC creates the social values of safety, security, fairness and efficiency to promote a more sustainable world where everyone has the chance to reach their full potential.