TOWARDS A FRAMEWORK FOR
FINANCIAL STABILITY

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April, 2007
Outline

I. What is meant by financial stability?
II. Changing trends in financial systems
III. The case of The Netherlands
IV. Policy framework
V. Monitoring framework
V. Implementation
I. What is meant by financial stability?
I. What is meant by financial stability?

Definitions:

- No agreement about what it means
- Most definitions focus on:
  Overcoming problems, vulnerabilities and risks to the financial system

“...maintaining confidence in the financial system...”
(Andrew Large, Bank of England)
I. What is meant by financial stability?

**DNB’s definition (2003):**

“Financial stability is a situation in which the financial system is capable of:

- Allocating resources between activities across time
- Assessing and managing financial risks and
- Absorbing shocks”

“There is no single ‘state’ of financial stability, but a continuum” Houben, Kakes and Schinasi (2004),
Outline

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III. The case of The Netherlands

IV. Financial stability framework

V. Policy framework

VI. Monitoring framework

VII. Implementation
II. Changing trends in the financial system

Changing trends in the global environment
- Deregulation
- Privatization
- Cross-border banking
- New range of financial instruments
- Diversification of investments outside banking system (new market players: hedge funds, private equity)
II. Changing trend in the financial system

Resulted in differences across national financial systems:

• Levels of concentration of the financial industry
• Internationalization of banks and insurers
• Banking model

=> “Buy and hold model”
=> “Originate to distribute”
i. Dutch financial system: characteristics
ii. Dutch financial system: Concentration

One of the most concentrated in the world

<table>
<thead>
<tr>
<th>Sector</th>
<th>Concentration</th>
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<tbody>
<tr>
<td>Banks</td>
<td>Top 5 (from 146): 81% of total assets</td>
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<tr>
<td>Insurers</td>
<td>Top 6 (from 636): 52% of total assets</td>
</tr>
<tr>
<td>Pension funds</td>
<td>Top 10 (from 839): 61% of total assets</td>
</tr>
</tbody>
</table>

of which: large and complex financial institut. (LCFI) ~ 60 %
iii. Dutch financial system: Internationalization

Active in cross-border activities, mergers & acquisitions

Level and growth of cross-border banking 2000-2005
iv. Dutch financial system: internationalization

Lending to emerging markets

Exposure Dutch banks in emerging markets in % of regulatory capital

- Central and East Europe
- Latin America
- Asia

Source: DNB
v. Dutch financial system: New financial intermediation model

- Non traditional activities: securitization
- Use of new financial instruments: derivatives
- Half of the income from banks is non interest related (e.g. commissions)
Outline

I. What is meant by financial stability?
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IV. Monitoring framework
V. Implementation
III. Policy framework used by DNB

- Monitoring: Define characteristics and vulnerabilities of financial system
- Assessments: Determine financial corridor or risk boundaries
- Implications: Prepare policy actions
III. Policy framework used by DNB
(Houben, Kakes and Schinasi)

- Institutions
- Markets
- Infrastructure

FINANCIAL SYSTEM

REAL ECONOMY

EXOGENOUS

ENDOGENOUS

PREVENTION
REMEDIAL ACTION
RESOLUTION

Shocks/vulnerabilities policy influence
III. Policy framework

Three stages...

Prevention
Monitoring, supervision, regulations, international standards and guidelines

Remedial action
Strengthen instruments, moral suasion and adjustment in macroeconomic policies

Resolution
Crisis management, business continuity and discretionary measures
III. Policy framework
Case: Large complex financial institutions

FINANCIAL SYSTEM
- Institutions
- Markets
- Infrastructure

REAL ECONOMY

Vulnerabilities system
Global imbalances
Oil prices
Political risks

Vulnerabilities institution
Pressures for consolidation
Search for yield
Highly leveraged households
Increase in cross-border linkages – systemic risk

Prevention: monitoring, regulation (Basel II, Solvency II), guidelines

Shocks/vulnerabilities

influence
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IV. Monitoring framework: Prevention

Consists of:
• Permanent assessments by DNB specialists
• External input (Banks, pension funds and insurers)
• Scenario Analysis
• Stress tests

Requires:
• Microdata: distributions
• Anectodal information
• Empirical modeling techniques
• Cooperation between departments, organisations
### IV. Monitoring framework Assessments

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<th>General assessment</th>
<th>Financial Stability Report</th>
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<td>Sep/06</td>
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<td>Mar-07</td>
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</table>

#### Financial conditions
- Abundant global liquidity
- Confidence

#### Imbalances
- Abnormal deficits (US current account deficit and its financing)
- Concentration of risks

#### Vulnerability
- Impact of higher interest rates (households and corporates)
- Rapid growth of hedge funds and private equity
- Rapid growth of complex financial instruments
- Search for yield
- Avian flu
- Political risks, oil shock
- Disruption liquidity

#### Instability
- Credit ratings, EMBI spreads, defaults

#### Impact on financial system
- Direct contagion: exposure, market functioning
- Indirect contagion: correlation, herding behavior

#### Impact financial system on eco
- Direct transmission: financing, asset prices
- Indirect transmission: confidence

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<th>Low risk</th>
<th>Medium risk</th>
<th>High risk</th>
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</table>
IV. Monitoring framework
Assessments

Applied to:
- Banks
- Pension funds
- Insurers
- LCFI and banks
- Households: Mortgage lending
- Corporates: Private equity
- US economy
- Emerging markets
- Financial markets
- Payments system
IV. Monitoring framework

Example: Mortgage lending
### IV. Monitoring framework

**Example: Mortgage lending**

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<tr>
<th>Monitoring Mortgage Lending</th>
<th>Financial Stability Report Mar-07</th>
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<td><strong>Financial conditions</strong></td>
<td>Household income</td>
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<td>Household lending</td>
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<td>Prices of houses</td>
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<td>Confidence</td>
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<td><strong>Imbalances</strong></td>
<td>Debt levels</td>
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<td>House value</td>
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<td><strong>Vulnerability</strong></td>
<td>Structure of debt (variable interest rates)</td>
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<td>Loan to value</td>
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<td>Loan to income</td>
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<td>Tax wedge</td>
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<td><strong>Instability</strong></td>
<td>Non performing loans, defaults 1/</td>
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<td><strong>Impact on financial system</strong></td>
<td>Direct contagion: exposures</td>
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<td><strong>Impact financial system on economy</strong></td>
<td>Direct: wealth effect</td>
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<td>Indirect effect: confidence</td>
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</tbody>
</table>

1/ Currently non-performing loans are not significant

- Low risk
- Medium risk
- High risk
IV. Monitoring framework
Example: Mortgage lending

Household Debt/GDP (End 2005)

Source: IMF
IV. Monitoring framework
Example: Mortgage lending
IV. Monitoring framework
Example: Mortgage lending

Household leverage 2005 (ratio liabilities to assets in%)

Source: IMF
IV. Monitoring framework
Example: Mortgage lending

Household NPLs
(In percent of total household credit)

- Bulgaria
- Turkey
- Czech Republic
- Poland
- India
- Malaysia
- Philippines
- Spain
- United States
- France
- Italy

NL
IV. Monitoring framework

Example: Mortgage lending

Loan to value ratios

Tax benefits

Source: Low et al. (2003), London Economics (2005) and national sources.
V. Implementation

i. Brainstorming
ii. Discussion coordination Group
iii. DNB Board
iv. Internal and external presentation
v. OFS
References
