



CROATIAN NATIONAL BANK

Croatian pre/post crisis perspectives
(with some legal considerations)

Impact of Financial Reforms in the Euro- Mediterranean Area

Marseille, 3-4 May 2018

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Content

- At the crossroad
- Pre – crisis / pre EU accession regulatory efforts
- Current standing (post Basel III / CRD IV)
- Proportionality
- Diversity – legal point of view

Croatia - a view from the crossroad

- Crossroad: Geographical, Political, Cultural
- The last country joining the EU – July 2013
- CRD IV package transposing Basel III in EU
 - 27 June 2013 published
 - 31 December 2013 transposition deadline
- Almost simultaneous - EU accession and CRD IV transposition

Economic environment before EU accession (pre crisis)

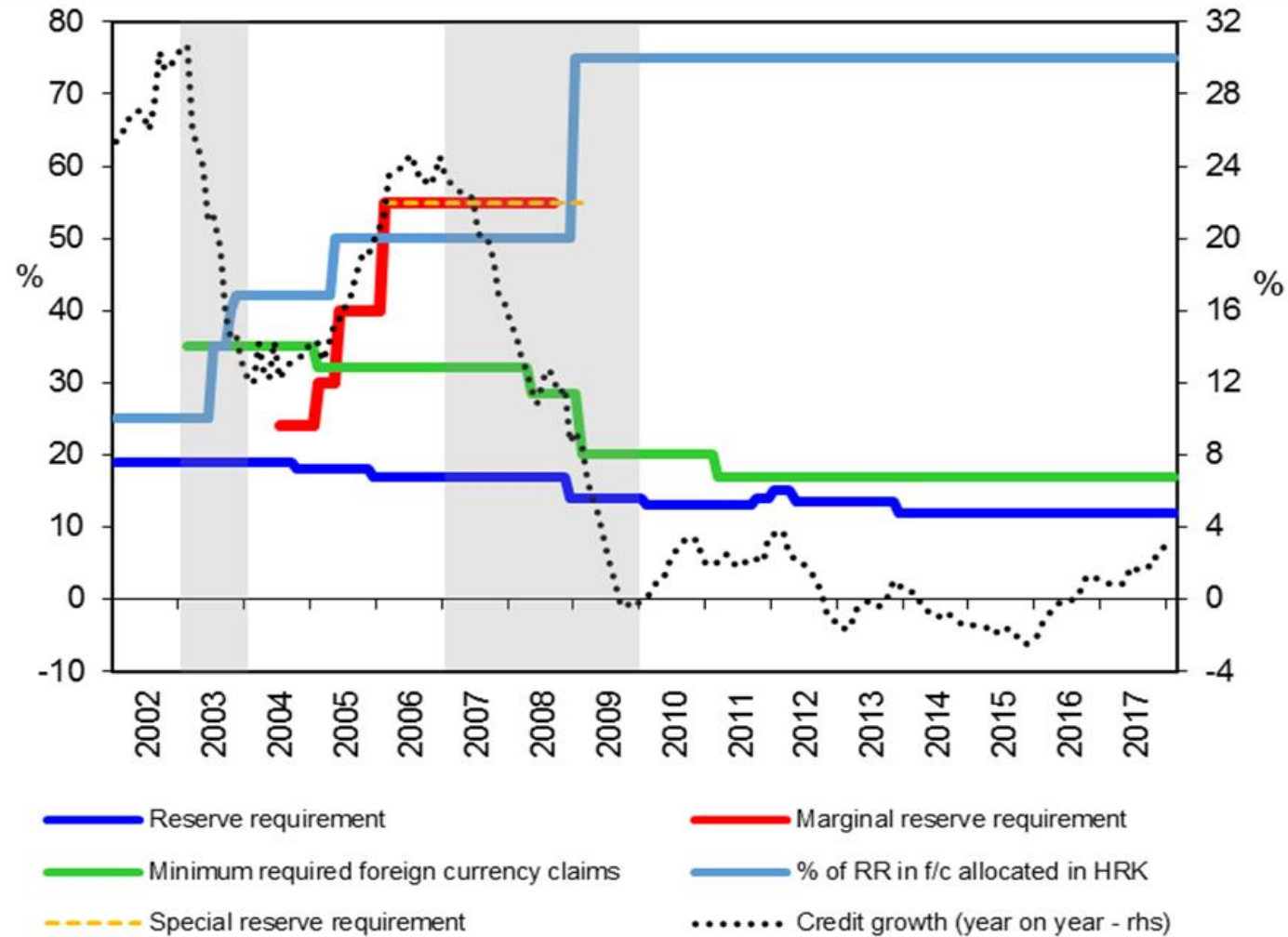
- Global environment:
 - financial liberalization
 - high global liquidity, low risk aversion
 - yield hunt

- Macroeconomic trends in Croatia (2002-2008)
 - stable real economic growth generated mostly by personal consumption
 - low inflation
 - excessive growth of bank placements to domestic sectors
 - increase in external debt due to external borrowing of banks and growing number of enterprises borrowing directly abroad
 - widening of the current account deficit

Regulatory (MP) measures before EU accession (pre crisis)

- Some important pre-crisis regulatory measures:
 - credit ceilings - restriction on credit growth
 - 16% (2003-2004)
 - 6%-12% (2007-2009)
 - minimum required foreign currency claims
 - marginal reserve requirements (MRR) 24 – 55% (2004-2008)
 - special reserve requirement (2006 - 2008)
 - high level of general reserve requirement (GRR)
 - certain % of foreign currency reserve requirement to be allocated in domestic currency (HRK)
 - increased capital requirements (risk weights) for currency induced credit risk (2006, 2008)
 - increased minimum capital adequacy ratio of 12% (2010-2013 Credit Institutions Act)

MP measures were introduced early and tuned timely



Shaded areas represent periods when banks' credit growth was regulated with compulsory CNB bills.

Source: CNB

Croatia and CEE countries – an avant-garde in scope and intensity of pre-crisis MP measures in Europe ...

	Caps on loan-to-value ratios	Caps on debt/loan-to-income ratios	Caps on foreign currency lending	Ceiling on credit or credit growth	Limits on net open currency positions/ currency mismatch	Limits on maturity mismatch	Reserve requirements	Countercyclical capital requirement	Time-varying/ dynamic provisioning	Restrictions on profit distribution
Austria										
Belgium										
Bulgaria										
Czech Republic										
Croatia										
Finland										
France										
Germany										
Hungary										
Ireland										
Italy										
Netherlands										
Norway										
Poland										
Portugal										
Romania										
Russia										
Serbia										
Slovakia										
Spain										
Sweden										
Switzerland										
Turkey										
UK										

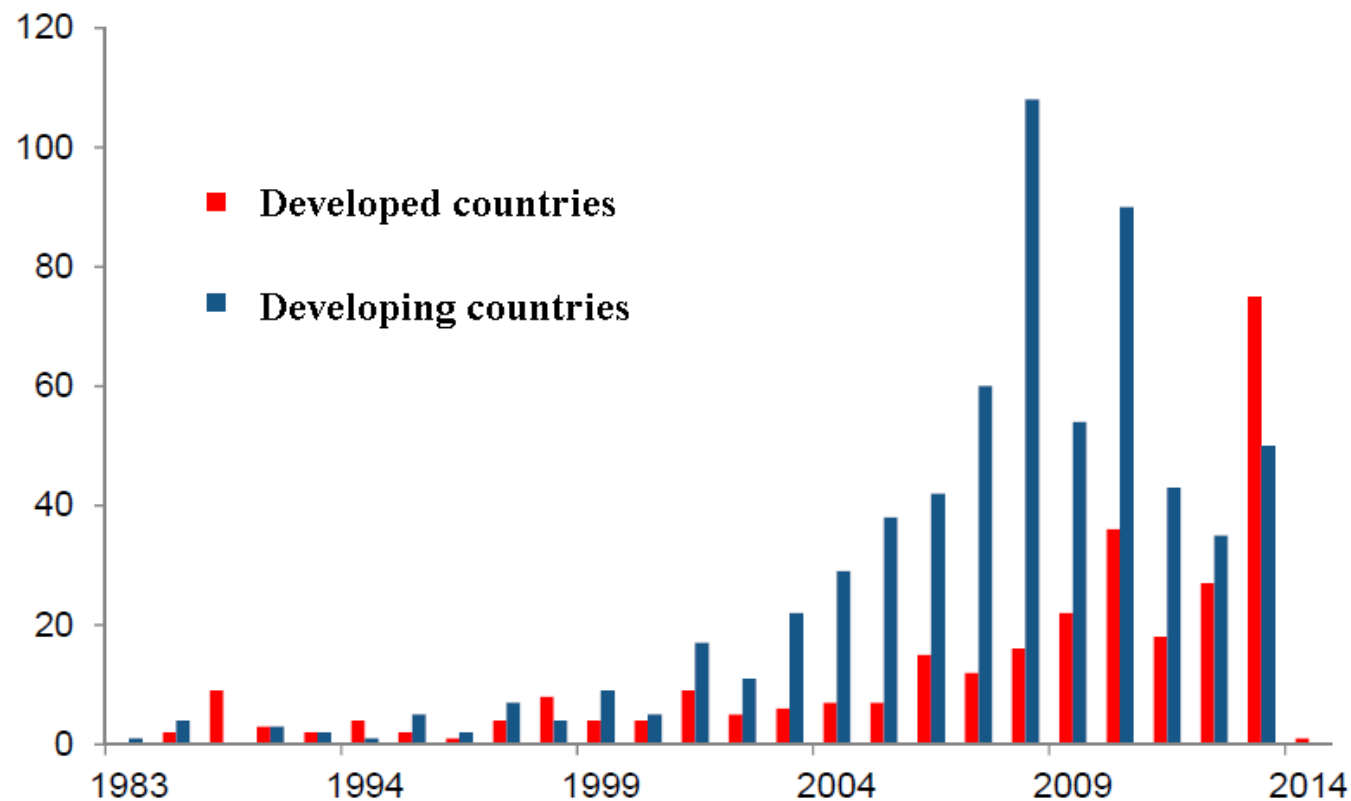
Note: 0 represents no use of instruments, and 1 denotes the use of a single instrument. For each of the following attributes, i.e., multiple, targeted, time-varying, discretionary and used in coordination with other policies, the value of 1 is added.



Source: Lim et al. , 2011
(Data from IMF Financial Stability and Macroprudential Policy Survey, 2010)

Similarly, until 2008 EMs were global outliers of MP policies

- Developed countries intensified their use only after 2008
- In Europe, MPP mostly used by CEE
- Most frequently used MPP instruments – related to:
 - credit activity
 - liquidity
 - capitalization



Note: The y-axis shows the number of countries that use MPP measures and instruments.

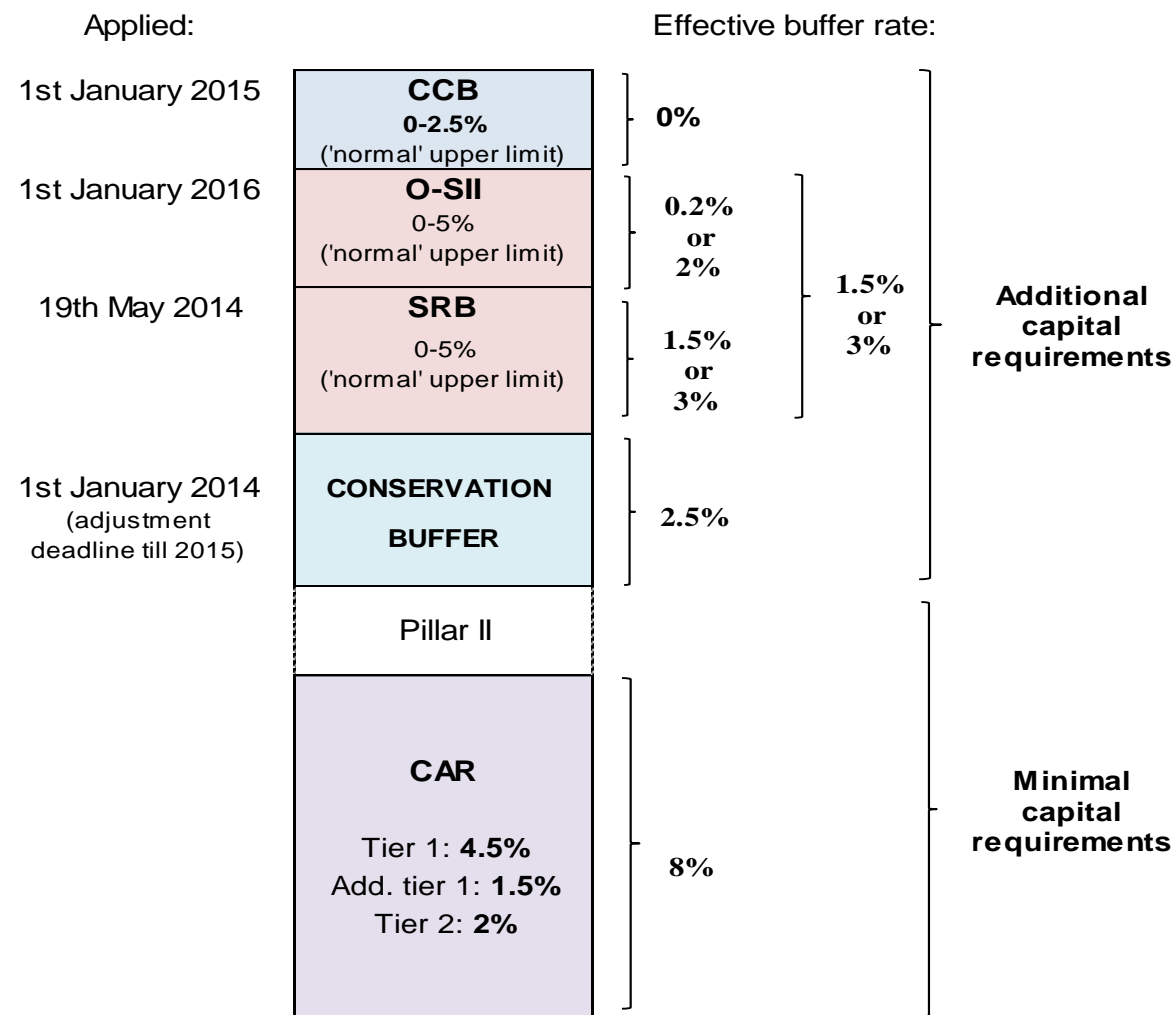
Source: Bank of England (2014) IMF Financial Stability and Macroprudential Policy Survey 2010

What was accomplished by pre EU/pre crisis MP policies?

- Higher resilience of financial system
- Slower accumulation of systemic risk
- Good preparation for the crisis – legacy of early CAR and liquidity requirements
- No failing banks as consequence of crisis
- Legal test of MP measures
 - satisfactory legal efficiency of instrument regulating MP measures
 - no notable challenges in court or before Constitutional Court
 - circumvention of MP instruments nevertheless attempted
 - foreign direct lending (to corporates) as consequence of introduction of MP tools not prevented

Current state of play in Croatia (end 2017)

- ❑ CRD IV package in full application
- ❑ Capital buffers →
- ❑ Risk weights for exposures secured by mortgages on RRE and CRE
- ❑ Risk indicators arising under CRD IV:
 - CAR 23,2 %
 - LCR 186%
- ❑ Still to come: CRR II
 - leverage ratios
 - NSFR
 - MREL /TLAC



So, institutions are well capitalised, liquid, risk managed... ... but what about proportionality?

- ❑ No special treatment under CRD IV with respect to size, type or other specificities of institutions
- ❑ Reporting perimeter under CRD IV changed for all institutions uniformly:
 - ❑ Before CRD IV (31 Dec. 2013) - 102 reports
 - ❑ After CRD IV (31 Dec 2017) - 206 reports
- ❑ Regulatory cost undeterminable, but possibly progressive along with the increasing reporting obligations
- ❑ Number of licensed institutions in Croatia decreasing (bankruptcy, transformation into branches, mergers, liquidation):
 - ❑ end 2013 - 35
 - ❑ end 2017 - 29
 - ❑ two recently announced mergers will likely decrease the number to 27

* *the measure and comparison only numerical - merely indicative, not precise in every respect*

Diversity – from a legal point of view

- Simultaneous transposition of Basel III into legislation of many jurisdictions globally almost unprecedented event in recent legal history.
- Uniform set of Basel standards vs. non-uniform transnational transposition and local application
- How transposition of standards into local laws and their application works in various countries:
 - **Absorption capacity** for implementation of laws/rules setting out complex matters
 - **How they fit within the system** of existing laws and interplay with other laws (compatibility - supranational / national)?
 - **How they fit into legal culture?**

Absorption capacity

”Regulatory Tsunami” for EU credit institutions (and supervisors)

- CRD IV package:
 - CRD IV (Directive)
 - CRR (Regulation)
 - 51 RTSs (Regulatory Technical Standards)
 - 33 ITSs (Implementing Technical Standards)
 - 3 Delegated acts
- ESRB Recommendations
- ...
- BRRD (Bank Resolution and Recovery Directive):
 - 7 RTSs
 - 4 ITSs
 - 5 delegated acts
- DGSD (Deposit Guarantee Scheme Directive)
 -
- SSM (Single Supervisory Mechanism)

Absorption capacity

(are judges macroeconomists?)

- Are laws implementing (Basel) standards in individual countries sufficiently comprehensible for all stakeholders, in particular:
 - industry
 - regulators
 - **judges**
 - **supporting service providers**
- Is terminology consistent with related laws and other instruments to enable uniform application?
- Will it contribute to legal certainty?

4. For the purposes of the undertakings referred to in Article 153(3), the LGD of a comparable direct exposure to a protection provider shall either be the LGD associated with an unhedged facility to the guarantor or the unhedged facility of the obligor, depending upon whether in the event both the guarantor and obligor default during the life of the hedged transaction, available evidence and the structure of the guarantee indicate that the amount recovered would depend on the financial condition of the guarantor or obligor, respectively.

(b) for derivatives shall be the exposure, without notional or weighting

(c) for exposure fully substituted

Article 162 Maturity

1. Institutions that have not received permission to use own LGDs and own conversion factors for exposures to corporates, institutions or central governments and central banks shall assign to exposures arising from repurchase transactions or securities or commodities lending or borrowing transactions a maturity value (M) of 0,5 years and to all other exposures an M of 2,5 years.

Alternatively, as part of the permission referred to in Article 143, the competent authorities shall decide whether the institution shall use maturity (M) for exposure as set out under paragraph 2.

2. Institutions that have received the permission to use own LGDs and own conversion factors for exposures to corporates, institutions or central governments and central banks pursuant to Article 143 shall calculate M for each of these exposures as set out in paragraph 1 and subject to paragraph 2. M shall be no greater than five years as specified in Article 384(1) where M as specified in paragraph 1.

(a) for an instrument subject to a haircut M shall be calculated according to the following formula:

$$M = \max \{ 1, \tau \}$$

where CF_t denote payments and fees received at period t

1. An institution which has permission to use own LGDs in accordance with point (d) of Article 153 shall calculate the EAD for determining the exposure at risk in accordance with Article 283, taking into account the impact of changes in the counterparty's creditworthiness, taking into account CVA.

An institution shall use its internal model for determining the exposure at risk associated with traded debt positions. The internal model shall take into account the impact of changes in the value of the reference asset.

The own funds requirements for CVA risk shall be calculated using the following formula:

$$CVA = LGD_{MKT} \cdot \sum_{i=1}^T w_i \cdot M_i$$

where:

- t_i = the time of payment i
- t_T = the longest maturity
- w_i = is the credit weight of the counterparty i . Where the institution uses a credit weight for the counterparty, it shall use the credit weight of the counterparty.

LGD_{MKT} = the LGD of counterparty i available in the industry

The first payment

EE_i = the expected exposure at time t_i set is t_i apply to t_i uses t_i

D_i = the discount factor

2. When calculating the own funds requirements, the institution shall use the following formula:

(a) where the institution uses the internal model

(b) where the institution uses the credit spread

i

B_i

= the notional of purchased single name credit default swap hedges (summed if more than one position) referencing counterparty "i" and used to hedge CVA risk.

That notional amount shall be discounted by applying the following factor:

$$\frac{1 - e^{-0.05 \cdot M_i}}{0.05 \cdot M_i}$$

$$1 - e^{-0.05 \cdot M_i}$$

Decision to adopt the regulatory technical standards in the first subparagraph of Article 14 of Regulation (EU) 2013/1093

(i) if $PD = 1$, i.e., for defaulted exposures, RW shall be calculated as follows:

$$RW = \max \{0, 12.5 \cdot (LGD - EL_{low})\}$$

institution's best estimate of the exposure in accordance with Article 14

the value for PD other than 1

1,06

probability equal to λ

the (i.e. the)

up to a limit established in the applicable legislation; if the terms of the instrument are not fully consistent with the applicable legislation;

individual in the substance

the graph is limited to the volatility of loss rates, especially in the case of retail exposure

retail exposure shall take into account the characteristics of the instrument

requirement to be collateralised credit risk in case amounts are taken into account

7. EBA shall develop draft regulatory technical standards to specify in greater detail:

(a) how a proxy spread is to be determined by the institution's approved internal model for the specific risk of debt instruments for the purposes of identifying significant and LGDMKT referred to in paragraph 1;

(b) the number and size of portfolios that fulfil the criterion of a limited number of smaller portfolios.

EBA shall submit those draft regulatory technical standards to the Commission by 1 January 2014.

Power is delegated to the Commission to adopt the regulatory technical standards referred to in the first subparagraph in accordance with Articles 10 to 14 of Regulation (EU) No 1093/2010.

Article 384 Standardised method

1. An institution which does not calculate the own funds requirements for CVA risk for its counterparties in accordance with Article 383 shall calculate a portfolio own funds requirements for CVA risk for each counterparty in accordance with the following formula, taking into account CVA hedges that are eligible in accordance with Article 386:

$$K = 2.33 \cdot \sqrt{h} \cdot \sqrt{\left(\sum_i 0.5 \cdot w_i \cdot \left(M_i \cdot EAD_i^{total} - M_i^{adjusted} \cdot B_i \right) - \sum_{ind} w_{ind} \cdot M_{ind} \cdot B_{ind} \right)^2 + \sum_i 0.75 \cdot w_i^2 \cdot \left(M_i \cdot EAD_i^{total} - M_i^{adjusted} \cdot B_i \right)^2}$$

where:

- h = the one-year risk horizon (in units of a year); $h = 1$;
- w_i = the weight applicable to counterparty "i".

Counterparty "i" shall be mapped to one of the six weights w_i based on an external credit assessment by a nominated ECAI, as set out in Table 1. For a counterparty for which a credit assessment by a nominated ECAI is not available:

- (a) an institution using the approach in Title II, Chapter 3 shall map the internal rating of the counterparty to one of the external credit assessment;
- (b) an institution using the approach in Title II, Chapter 2 shall assign $w_i=1.0\%$ to this counterparty. However, if an institution uses Article 128 to risk weight counterparty credit risk exposures to this counterparty, $w_i=3.0\%$ shall be assigned;

EAD_i^{total} = the total counterparty credit risk exposure value of counterparty "i" (summed across its netting sets) including the effect of collateral in accordance with the methods set out in Sections 3 to 6 of Title II, Chapter 6 as applicable to the calculation of the own funds requirements for counterparty credit risk for that counterparty. An institution using one of the methods set out in Sections 3 and 4 of Title II, Chapter 6, may use as EAD_{total} the fully adjusted exposure value in accordance with Article 223(5).

For an institution not using the method set out in Section 6 of Title II, Chapter 6, the exposure shall be discounted by applying the following factor:

$$\frac{1 - e^{-0.05 \cdot M_i}}{0.05 \cdot M_i}$$

= the notional of purchased single name credit default swap hedges (summed if more than one position) referencing counterparty "i" and used to hedge CVA risk.

That notional amount shall be discounted by applying the following factor:

$$1 - e^{-0.05 \cdot M_i}$$

How the implemented laws fit with existing laws of countries?

- ❑ Every decision of competent authority may be challenged or subject to judicial review in respective country
- ❑ Appetite for challenging raise usually at wrong moment – in situations of threats (risks) to financial stability
- ❑ Typical grounds for legal challenges:
 - inconsistencies among and between different EU and state laws
 - alleged violations of constitutional principles in respective countries
- ❑ Other potential obstacles for smooth application of implemented laws:
 - procedural laws in respective countries
 - company, property laws, etc.

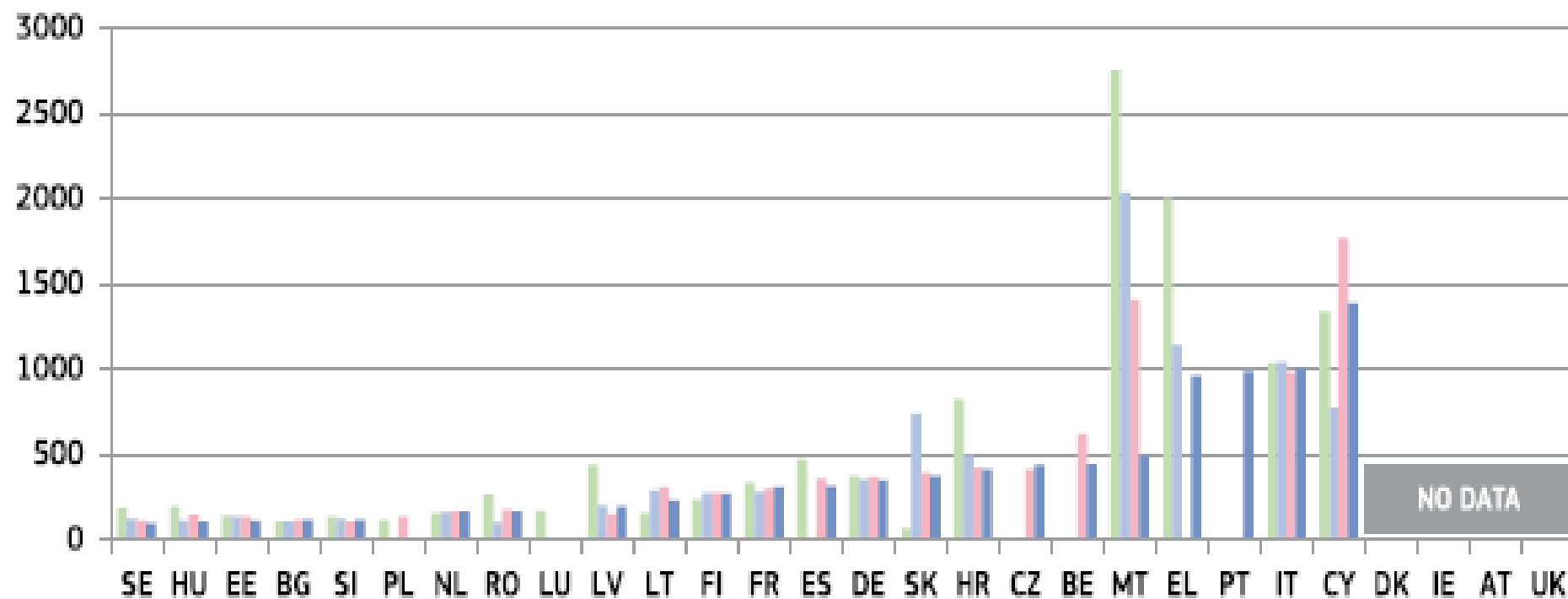
How implemented laws fit into legal culture of countries?

- Legal Culture - unclear concept usually describing differences between legal systems (common/civil law), historical influences, legal institutes/concepts
- Effectiveness of implemented laws depend also on the efficiency of national justice systems
- EU sources:
 - *EU JUSTICE SCOREBOARD - Communication from the Commission to the European Parliament, the Council, the **European Central Bank**, the European Economic and Social Communication from the Commission COM(2017) 167*
 - *CEPEJ publications - Council of Europe European Commission for the efficiency of justice Efficiency and quality of justice, CEPEJ Studies No. 23, Edition 2016 (2014 data)*

Time needed to resolve administrative cases(*) (1st Instance/In days)



Source: CEPEJ study

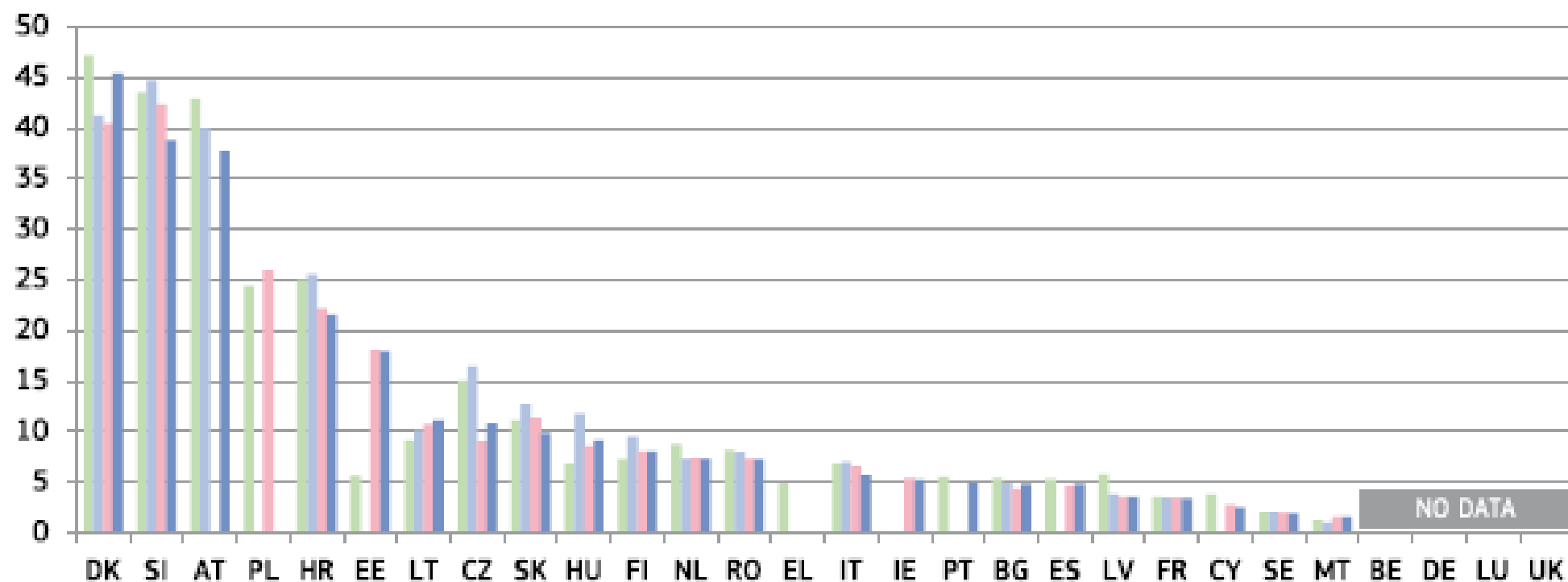


(*) Administrative law cases concern disputes between citizens and local, regional or national authorities, under the CEPEJ methodology. Methodology changes in HR, HU and PL. Pending cases include all instances in CZ and SK. DK, IE and AT do not record administrative cases separately. DE: Data solely based on the statistics on the administration of justice published by the German Federal Statistical Office.

Number of incoming civil, commercial, administrative and other cases (*) (1st instance/per 100 inhabitants)



Source: CEPEJ study^(*)

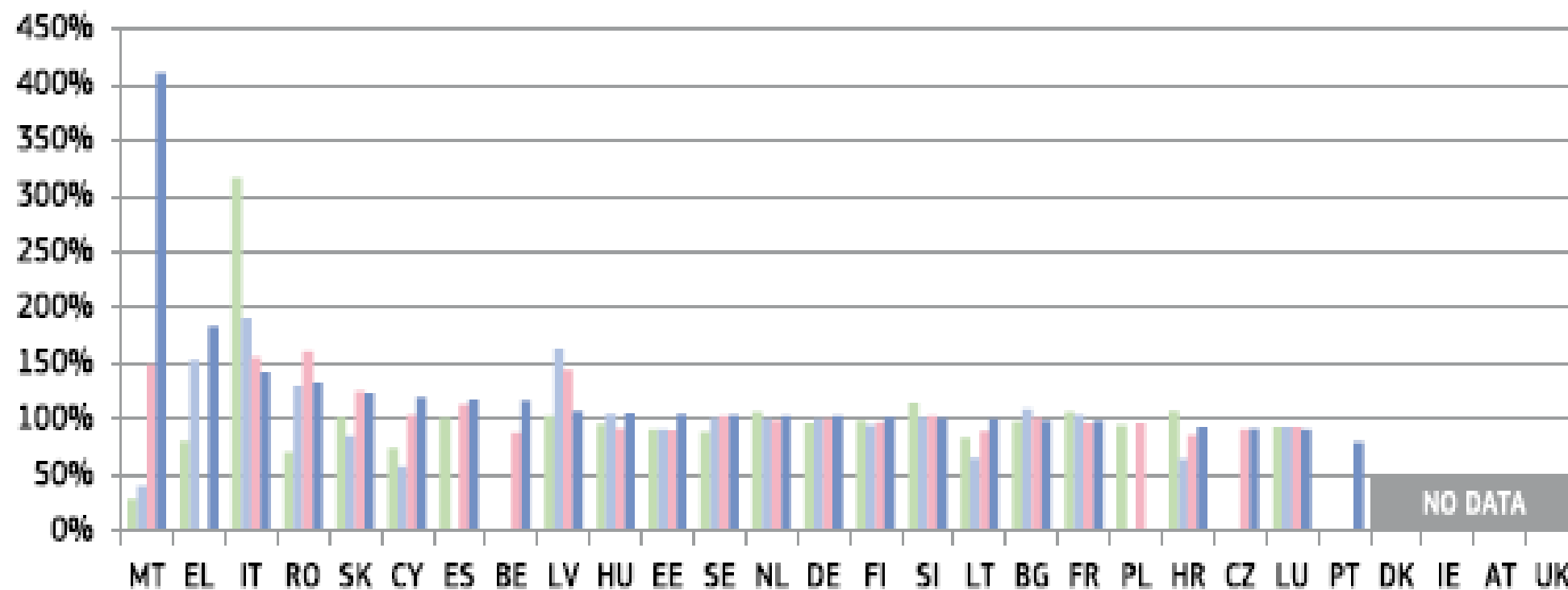


(*) Under the CEPEJ methodology, this category includes all civil and commercial litigious and non-litigious cases, non-litigious land and business registry cases, other registry cases, other non-litigious cases, administrative law cases and other non-criminal cases. Methodology changes in CZ, HR, MT, FI.

Rate of resolving administrative cases (*) (1st Instance/ in %)



Source: CEPEJ study

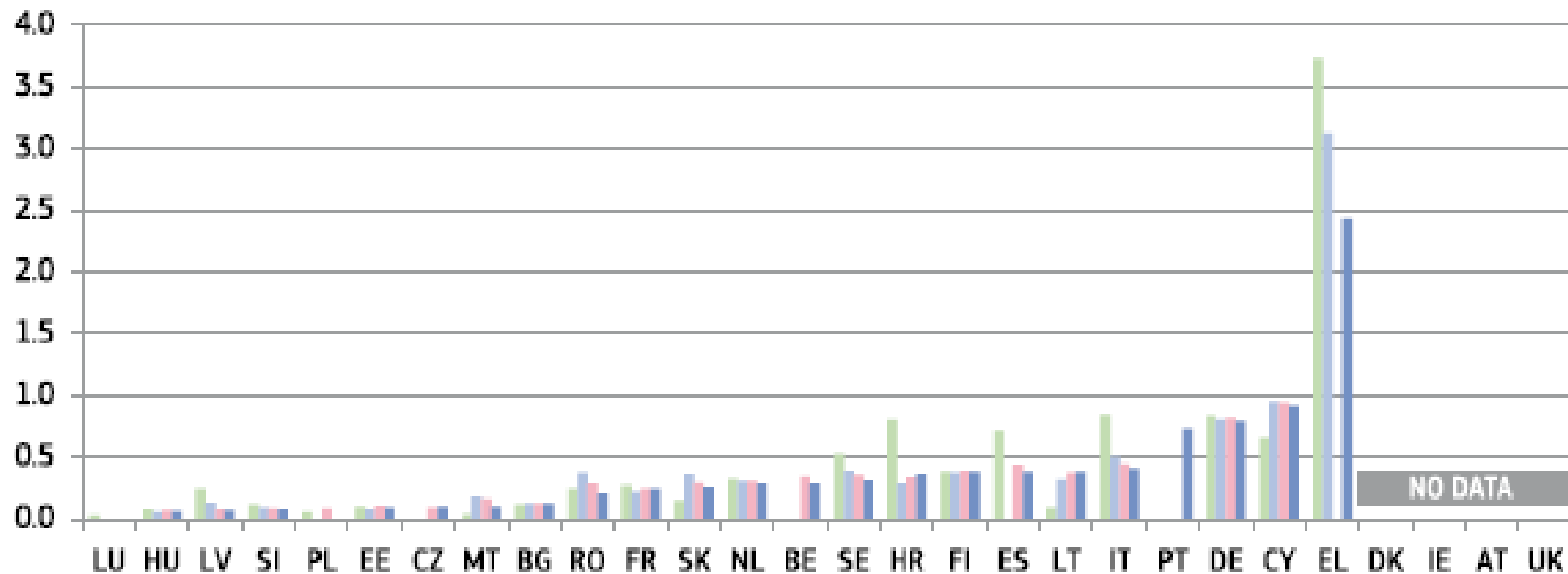


(*) Methodology changes in HU and FI. Reorganisation of the administrative court system in HR. Pending cases include all instances in CZ and SK. DK, IE and AT do not record administrative cases separately. DE: Data solely based on the statistics on the administration of justice published by the German Federal Statistical Office.

Number of pending administrative cases (*) (1st instance/per 100 inhabitants)



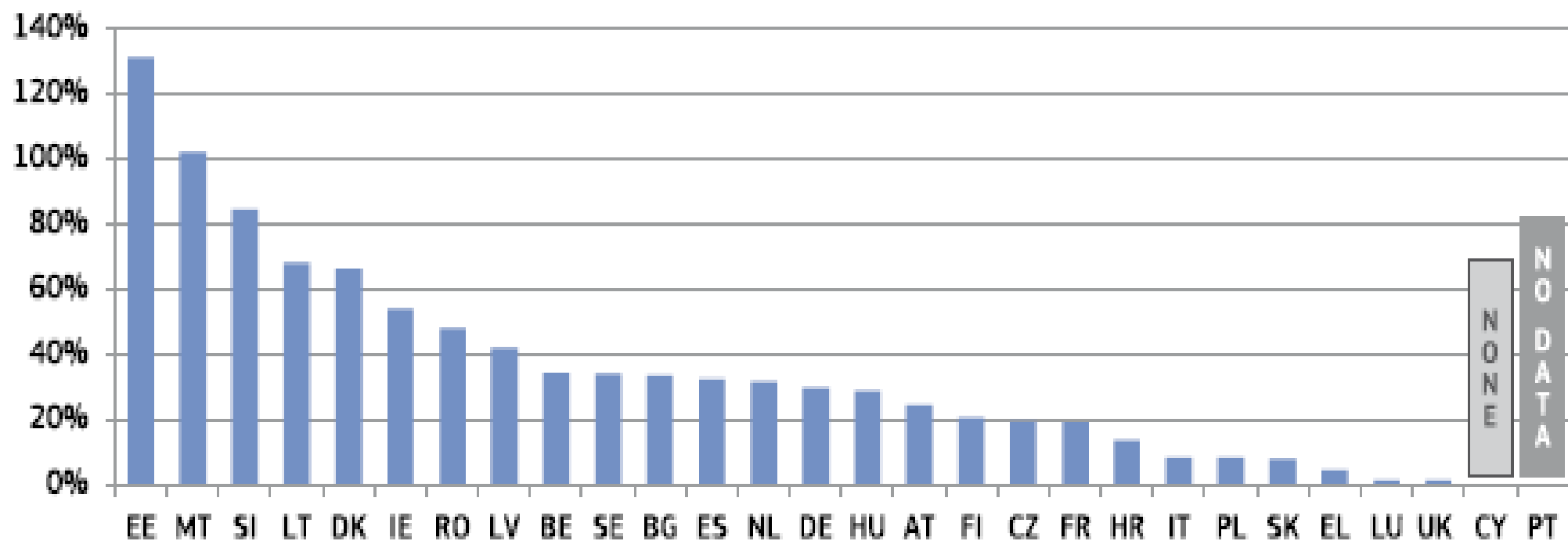
Source: CEPEJ study



(*) Methodology changes in HR, HU and FI. Pending cases include all instances in CZ and SK. DK, IE and AT do not record administrative cases separately. DE: data solely based on the statistics on the administration of justice published by the German Federal Statistical Office.

Judges participating in continuous training activities in EU law or in the law of another Member State (*) (as a percentage of total number of judges)

Source: European Commission, European judicial training report 2016 (**)



(*) In a few Member States the ratio of participants exceeds 100%, meaning that some participants attended more than one training activity. AT data includes prosecutors, DK includes court staff.

Closing the circle ...

- ❑ Accomplished quest for stability - from stochastic and individual to systemic and multilateral
- ❑ Hopes for more proportionality (and less diversity)
- ❑ How far the regulatory pendulum will continue in the current direction?
- ❑ Opportunities for deregulation and simplification?
- ❑ Consequences of neglecting the opportunities
- ❑ Involving and raising awareness among remaining stakeholders

THANK YOU