# *AnaCredit*
# Entering a new world of regulatory reporting

*AnaCredit Benchmark Study*

*PwC Europe*
*March 2017*

pwc

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# *Contents*

# About PwC Europe's AnaCredit benchmark study

AnaCredit is just the beginning of a new age of reporting requirements: Statistical reporting requirements will become more and more granular following ECB's long-term objective "collect data only once" and taking into consideration ESCB initiatives like the "Banks integrated reporting dictionary" project ("BIRD"). Even though those data are primarily collected for statistical purposes, the ECB supervisor may – and will – have access to the data as well. Especially the possibility for the ECB as a supervisor to use this granular data for supervisory purposes will lead to a new level of transparency on bank's business models, risk appetite and data quality and also enhance the requirements for data consistency in regulatory reporting.

With respect to the importance of those developments for the whole financial industry in Europe, we conducted a Euro area-wide benchmark study to determine the impact of AnaCredit on existing processes and systems as well as the costs and key challenges within financial institutions throughout Europe.
Therefore, we interviewed bank executives responsible for AnaCredit with detailed questionnaires. In total 48 banks from 9 different European countries participated in our study which provides a comprehensive overview on the effects and implications AnaCredit requirements are expected to have among banks in Europe.

The first part of this report provides some background information on AnaCredit and the AnaCredit benchmark. The second part of this report contains the main results of the survey. The report offers bank executives responsible for AnaCredit a great basis for benchmarking their institution with European peers and is also providing useful insights and ideas on how other banks are working with the challenges stemming from AnaCredit.

In this context, we would like to thank our colleagues all over Europe who contributed to this successful study! In particular, we would like to thank Sophie de Vries, Martijn Ars, Michelle Bentlage, Nicolien Sanders, Andrea Glatzel, Friedemann Loch, Sebastian L. Sohn, Dominik Steininger, and Jonas Geelhaar for their great work with initiating, managing and analysing the AnaCredit study.

With the insights from our AnaCredit study and our experience from 12 projects by now, PwC is one of the AnaCredit thought leaders in Europe. Learn more about PwC's best practice approach in this report and check out our AnaCredit expertise yourself!

*Anthony Kruizinga*
Partner,
EMEA FS Advisory
Risk & Regulation

*Eugenie Krijnsen*
Partner,
Banking &
Fin Tech

*Martin Neisen*
Partner,
FS Regulatory
Management

*Sven Kilz*
Partner,
FS Technology
Consulting

PricewaterhouseCoopers N.V.
Netherlands

PricewaterhouseCoopers GmbH WPG
Germany

# *Management summary*

After having had insightful and deep discussions on AnaCredit with 48 banks within 9 European countries, we have concluded that most banks will manage to fulfill the AnaCredit requirements in time. The key challenges are data availability and data quality.

The key messages as a result of our survey can be summarised as follows:

**1** Data availibility is the number one challenge of AnaCredit, but most banks are confident that they will solve this challenge in time

**2** The data quality of most attributes is up to standard. However, the quality of the client financial indicator and collateral data is most questionable

**3** AnaCredit is expensive: depending on a bank's complexity, implementation costs range from less than €1 million up to more than €6 million

# Background AnaCredit and survey structure

# *Background AnaCredit*

In 2014, the European Central Bank (ECB) announced the development of a central credit register that should be populated by granular credit and credit risk data of all Euro area banks. The objectives of this credit database are to obtain additional data for statistical purposes, to support the European System of Central Banks (ESCB) and the ECB with their monetary policy and macro prudential activities.

In May 2016, the Governing Council of the ECB adopted the regulation on the collection of granular credit and credit risk data ("AnaCredit"). AnaCredit requires banks to report 95 attributes on a loan-by-loan level with regard to clients/counterparties whose total commitment amounts for all eligible instruments equals or exceeds €25,000 within the reference period. Eligible instruments include deposits, overdrafts, credit card debt, credit lines, trade receivables, financial leases, and any other loans.
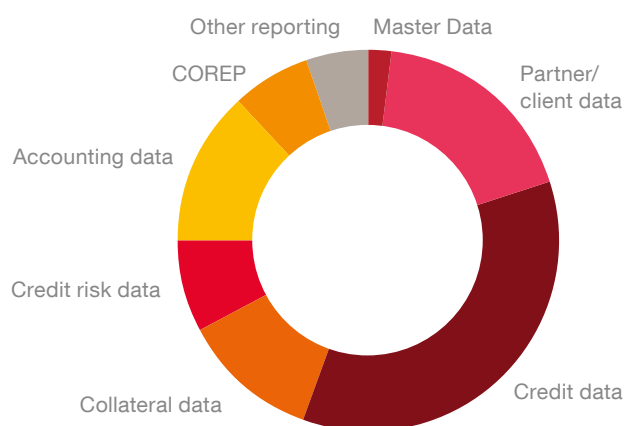
These data attributes have to come from different data dimensions within a bank's organisation and are related to the reportable instrument, the collateral or guarantee securing the instrument, and the counterparty involved in their respective roles.

Furthermore, the ECB regulation contains requirements at national discretion which will be detailed by the national central banks for their respective jurisdiction, i.e. earlier submission dates, an extension of clients and loans in scope but also derogations and facilitations. Banks with business activities in more than one Euro area country may have to implement several different national discretions. Furthermore, they will have to prepare for a potential double reporting to more than one national central bank.

Therefore, AnaCredit is a big challenge for some banks, especially those that reside in countries with less granular reporting requirements in place.

The regulation foresees the launch of the initial data collection in September 2018, which gives credit institutions at least two years of preparation time. From that date however, the required data will be collected on a monthly or quarterly basis dependent on the data.

Relevant data domains



Other reporting
Master Data
COREP
Partner/client data
Accounting data
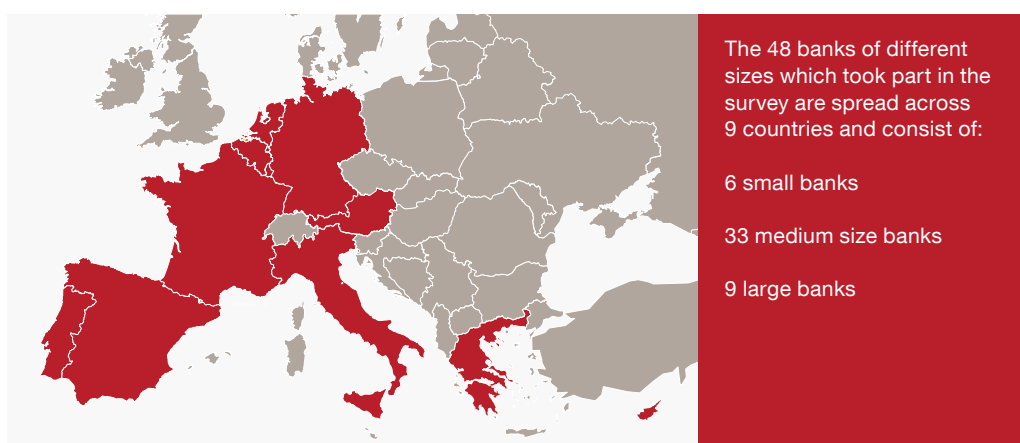Credit risk data
Collateral data
Credit data

# One ECB regulation with several national differences

For the AnaCredit survey we interviewed 48 AnaCredit specialists - of which, predominantly Senior Managers Finance and AnaCredit project leaders – using a standardised questionnaire.

From these interviews, we were able to gather interesting insights in the current status of the AnaCredit projects and the key challenges regarding implementation.

The results have been aggregated and consolidated by a central team and the key results and insights are provided in this report.



The 48 banks of different sizes which took part in the survey are spread across 9 countries and consist of:

6 small banks

33 medium size banks

9 large banks

Some differences per country can be identified:
- In Austria a common platform ("Gemeinsames Meldewesen Plattform" (GMP)) was established to cover overall regulatory reporting requirements. This platform will also be used for AnaCredit reporting, currently covering about 80% of the requirements. Challenges regarding data availability and sourcing of critical attributes remain.
- The Bank of Portugal is considering to update a report currently in force (CRC) and to use it to collect AnaCredit data in order to submit it to ECB. The remaining data will most likely be obtained by the Portuguese Tax and Customs Authorities
- In Germany, the banks started relatively early with the AnaCredit projects. Most banks are currently designing the AnaCredit implementation, some banks already started their IT implementation.

# *Results AnaCredit survey*

# *Providing all data with the right quality as the main challenge*

In this part of the report the key results of the AnaCredit survey are presented. Since AnaCredit provides many of the respondents with a number of challenges, the report will first elaborate on the key challenges in implementing AnaCredit. In the next pages the top three key challenges will be analysed in depth. Finally, this report provides an overview of how the AnaCredit projects are organised within banks.

### *Main challenges of implementing AnaCredit*
AnaCredit is the beginning of statistical reporting at contract level on a monthly basis.
As a result many departments within the bank will be heavily impacted by AnaCredit regulations, with the Finance/Regulatory Reporting department being most heavily affected.

The top three challenges identified by the banks are:
1. Data availability
2. Data quality
3. Infrastructure / IT transformation

They are followed by changes to unclear requirements and internal processes.

**Key challenges of AnaCredit**
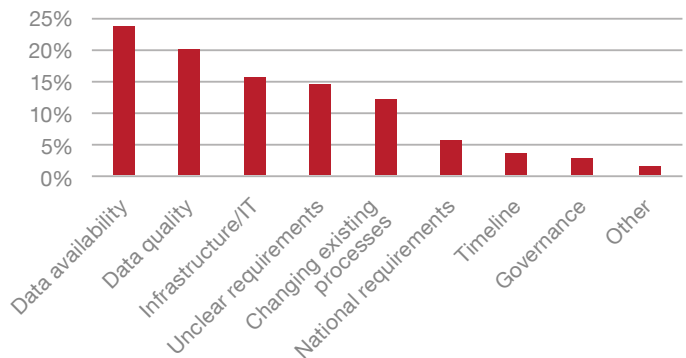


### *Benefits of implementing AnaCredit*
Most banks expect that the overall data quality will improve as a result of implementing AnaCredit, but they do not yet have a clear view on how they will use AnaCredit data for other purposes than risk analysis. 14% of the respondents even indicate that they do not intend to use the AnaCredit data for their own analysis at all. For the majority however (57%) it is not clear yet how the additional AnaCredit data can be used. In the interviews the following benefits of this regulation were mentioned:
1. Improvement of the current data quality.
2. Optimisation of processes and IT will be achieved.
3. AnaCredit fills the new Data warehouse with information.
4. AnaCredit is a bridge between Finance, Risk and regulation.

# Most banks still lack data attributes necessary for AnaCredit

The most challenging part of implementing AnaCredit is the data availability. The following data attributes are lacking at most of the banks: "number of employees", "enterprise size classification" and "changes in fair value due to credit risk". In addition, a few banks mentioned that the data attributes such as LEI code and SME indicator are not available which are also part of other reportings like the Financial Reporting (FINREP) and Common Reporting (COREP).

## Availability data attributes



Bar chart with legend: ■ Major ■ Medium ■ Minor ■ No change required

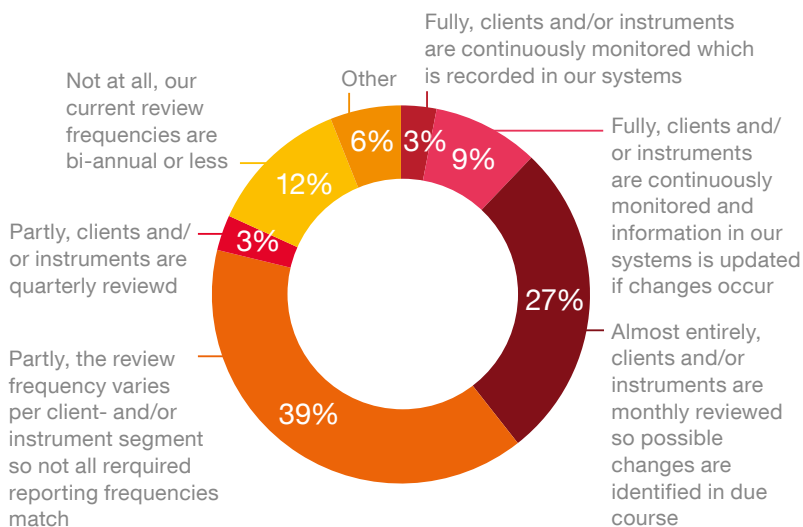| Attribute | No change required | Minor | Major/Medium |
|---|---|---|---|
| Purpose of the instrument | 32 | 3 | 35 |
| Impairments and provisions per loan | 35 | 4 | 27 |
| Number of employees | 10 | 8 | 23 |
| Probability of Default of the borrower | 37 | 10 | 15 |
| Status of legal proceedings | 22 | 1 | 15 |
| Other | 6 | 5 | 13 |
| Enterprise size classification | 17 | 4 | 12 |
| Changes in fair value due to changes in credit risk per loan | 13 | 1 | 12 |
| Economic activity ("NACE3 code") | 37 | 3 | 8 |
| Default status of the instrument | 32 | 4 | 7 |

## Adequate time review process of the data attributes



Donut chart with segments:
- Fully, clients and/or instruments are continuously monitored which is recorded in our systems — 3%
- Fully, clients and/or instruments are continuously monitored and information in our systems is updated if changes occur — 9%
- Almost entirely, clients and/or instruments are monthly reviewed so possible changes are identified in due course — 27%
- Partly, the review frequency varies per client- and/or instrument segment so not all rerquired reporting frequencies match — 39%
- Partly, clients and/or instruments are quarterly reviewd — 3%
- Not at all, our current review frequencies are bi-annual or less — 12%
- Other — 6%

Regarding the challenge of data availability, another important aspect is an adequate review frequency of the data attributes. If changes take place, the relevant attributes must be updated no later than the monthly transmission of the data. 57% of the respondents indicate that their current review process does not entirely match the review frequency of AnaCredit.

About 27% of the required AnaCredit data attributes are currently not digitally available, of which almost 59% are not yet recorded at all within banking systems. As expected, small banks have less data readily available in the banking systems compared to large banks.

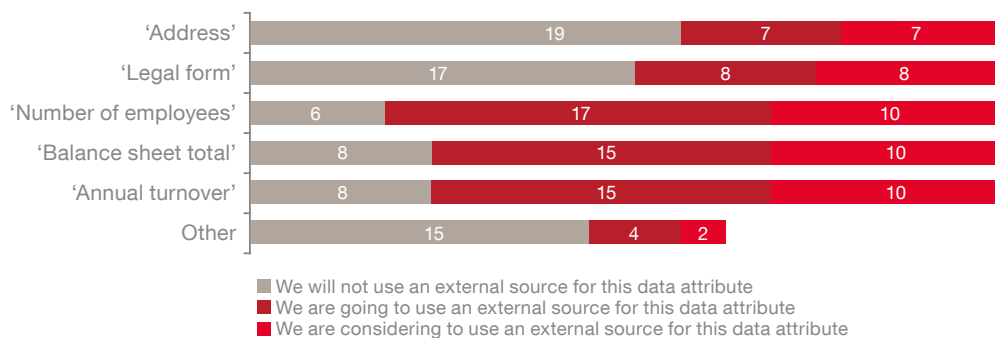# *Data needs to be gathered from a variety of sources*

Most banks have two to five data sources in which the data attributes of AnaCredit are registered. In most cases, large banks need at least 11 sources to produce the data. Three of the large banks need to gather the data from over 30 sources. In contrast, one large bank already has the data available in one source.

**Number of data sources with AnaCredit data**

| | |
|---|---|
| Only 1 data source | 3 |
| 2-5 data sources | 24 |
| 6-10 data sources | 6 |
| 11-20 data sources | 10 |
| 21-30 data sources | 2 |
| More than 30 data sources | 3 |
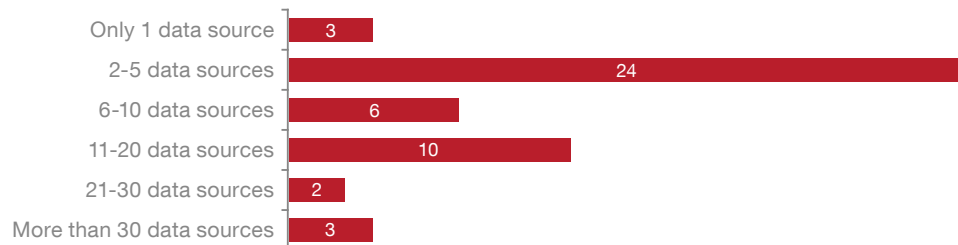
About 61% of the banks mentioned that they need minimal (fields only need to be arranged in the right order) or minor (limited processing required on the data elements) processing to generate the required AnaCredit dataset. A majority of banks considers or already plans to gather "number of employees", "balance sheet total" and "annual turnover" from external sources. This data will be received from credit registration offices and company information bureaus. In most cases, this data can automatically be uploaded in the systems.

**Data attributes from external sources**

| | We will not use an external source | We are going to use an external source | We are considering to use an external source |
|---|---|---|---|
| 'Address' | 19 | 7 | 7 |
| 'Legal form' | 17 | 8 | 8 |
| 'Number of employees' | 6 | 17 | 10 |
| 'Balance sheet total' | 8 | 15 | 10 |
| 'Annual turnover' | 8 | 15 | 10 |
| Other | 15 | 4 | 2 |

■ We will not use an external source for this data attribute
■ We are going to use an external source for this data attribute
■ We are considering to use an external source for this data attribute
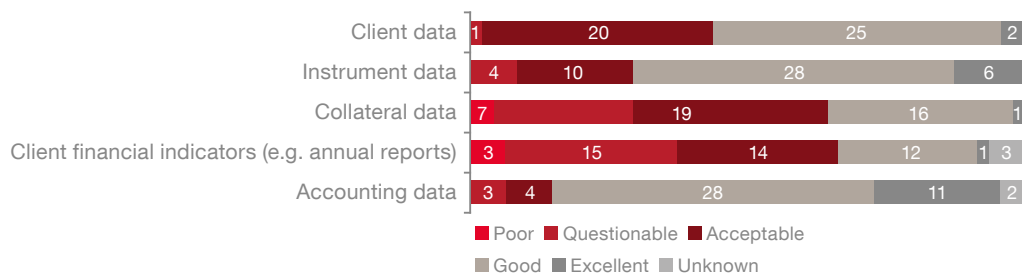
# *Data issues are being solved in various ways, systematic & manually*

When data attributes within banks are available, the quality is not always up to standard. However, for many banks data quality is less of a challenge than data availability. The two data attributes that have the highest responses for poor or questionable quality are the "client financial data" and the "collateral data". External providers of source data are considered to have good data quality compared to a bank's internal data.
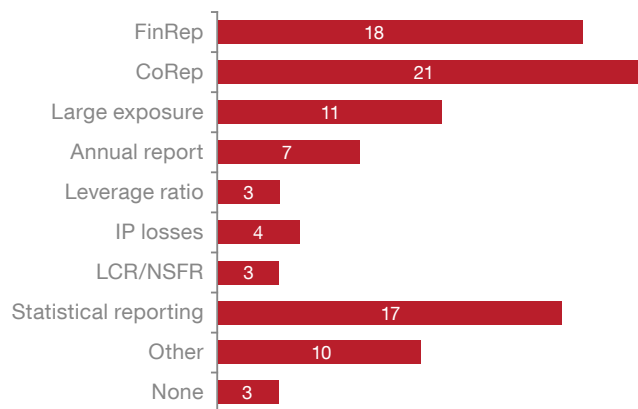
## Data quality of data attributes

| | Poor | Questionable | Acceptable | Good | Excellent | Unknown |
|---|---|---|---|---|---|---|
| Client data | 1 | 20 | | 25 | 2 | |
| Instrument data | 4 | 10 | | 28 | 6 | |
| Collateral data | 7 | 19 | | 16 | 1 | |
| Client financial indicators (e.g. annual reports) | 3 | 15 | 14 | 12 | 1 | 3 |
| Accounting data | 3 | 4 | | 28 | 11 | 2 |

To close the data gaps between the required AnaCredit data fields and available data/data quality, banks prefer to adjust core systems to process data attributes automatically. However, there is a substantial number of banks that will enter data manually.

To ensure the data quality, banks expect to perform various controls. Most of the banks (78%) will perform automated controls and reconciliation, whereby the data will be reconciled with the FinRep, CoRep and statistical reporting. Other common controls are manual validation checks and data owner's responsibility. A single bank mentioned trend analysis and the use of anomalies.

## Reports used for reconciliation with AnaCredit data

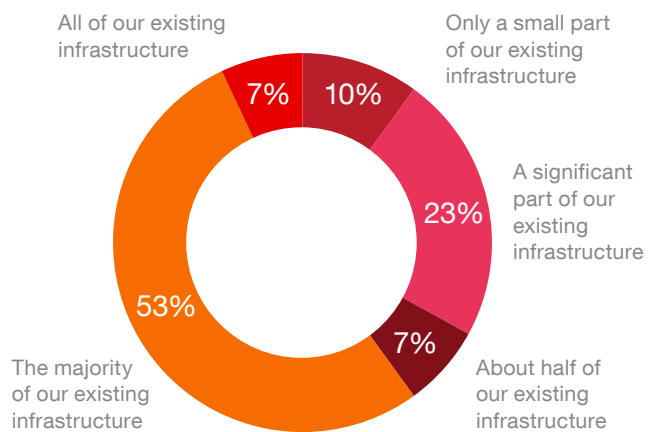| Report | Value |
|---|---|
| FinRep | 18 |
| CoRep | 21 |
| Large exposure | 11 |
| Annual report | 7 |
| Leverage ratio | 3 |
| IP losses | 4 |
| LCR/NSFR | 3 |
| Statistical reporting | 17 |
| Other | 10 |
| None | 3 |

Banks will use different approaches to process the feedback of the ECB. Automated processing in core administration, manual distribution to resolution teams and workflow supported distribution to resolution teams are processes indicated to be used.

# *Current regulatory reporting infrastructure can be re-used*

To implement AnaCredit, most banks can re-use the majority of the current infrastructure for existing regulatory reporting requirements. Only 10% of the banks have a real challenge to develop and implement an almost complete new infrastructure for AnaCredit.

In general, banks will implement AnaCredit in the infrastructure of IFRS, BCBS 239, CoRep/FinRep and/or statistical reporting. A few banks will re-use the infrastructure of AQR, FATCA, AMIR and MiFID/MiFIR.
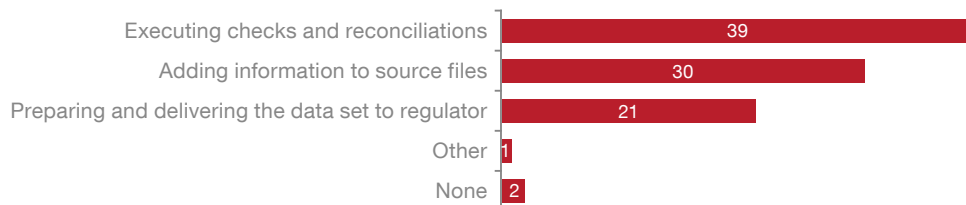
All of our existing infrastructure

Only a small part of our existing infrastructure

A significant part of our existing infrastructure

7%  10%

23%

53%  7%

The majority of our existing infrastructure

About half of our existing infrastructure

During the time of the interviews, not all the banks had as yet decided on how the AnaCredit reporting solution would be created. Most banks intend to buy off-the-shelve solutions or add modules to existing systems they use for their AnaCredit reporting solution. Only 10% of respondents indicated that they will choose an individual/tailored solution. Most banks choose to implement the reporting solution in a phased development of functionality. 17% of the banks will implement the reporting solution at once and 13% of the banks need to implement a short term solution to be able to report to the ECB in time. This short term solution will be replaced in a later stage for a sustainable long term solution.

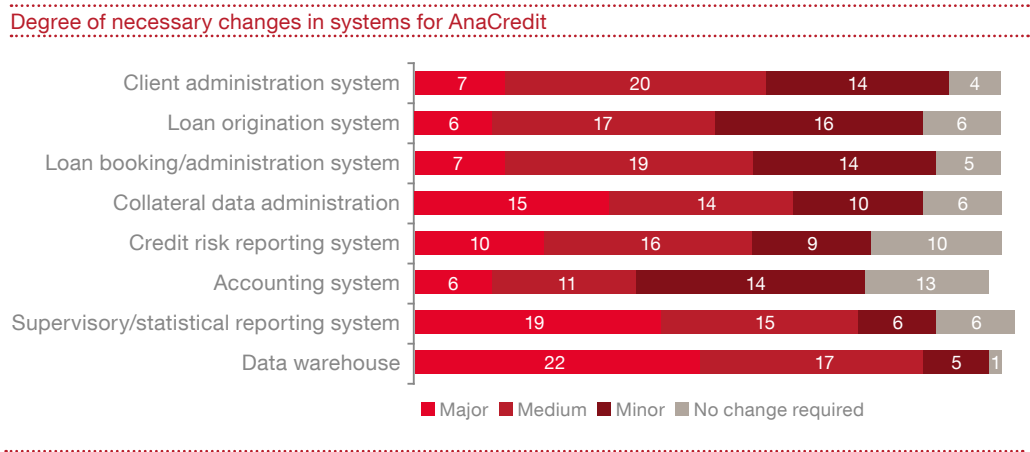## Data quality checks implemented for AnaCredit

To address data qualty issues, banks are planning to implement the following measures:

| Measure | Value |
|---|---|
| Executing checks and reconciliations | 39 |
| Adding information to source files | 30 |
| Preparing and delivering the data set to regulator | 21 |
| Other | 1 |
| None | 2 |

In order to obtain a complete dataset with the AnaCredit requirements, banks will execute one or more manual interferences such as executing checks and reconciliations, adding information to source files and preparing and delivering the data set to regulator. 37% of the respondents expect to have, although limited, manual actions per cycle. The estimation is 10 to 30 hours per month.

Most changes have to be implemented in the data warehouse, supervisory/ statistical reporting system and collateral data administration.
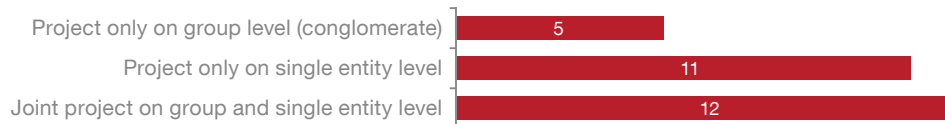
**Degree of necessary changes in systems for AnaCredit**

| System | Major | Medium | Minor | No change required |
|---|---|---|---|---|
| Client administration system | 7 | 20 | 14 | 4 |
| Loan origination system | 6 | 17 | 16 | 6 |
| Loan booking/administration system | 7 | 19 | 14 | 5 |
| Collateral data administration | 15 | 14 | 10 | 6 |
| Credit risk reporting system | 10 | 16 | 9 | 10 |
| Accounting system | 6 | 11 | 14 | 13 |
| Supervisory/statistical reporting system | 19 | 15 | 6 | 6 |
| Data warehouse | 22 | 17 | 5 | 1 |

■ Major ■ Medium ■ Minor ■ No change required

# *Despite the challenges, banks have confidence they will be ready in time*

## *Project structure and dependencies*

Most banks organise their AnaCredit projects as a joint project on group and single entity level. The number of projects only organised on group level is limited.
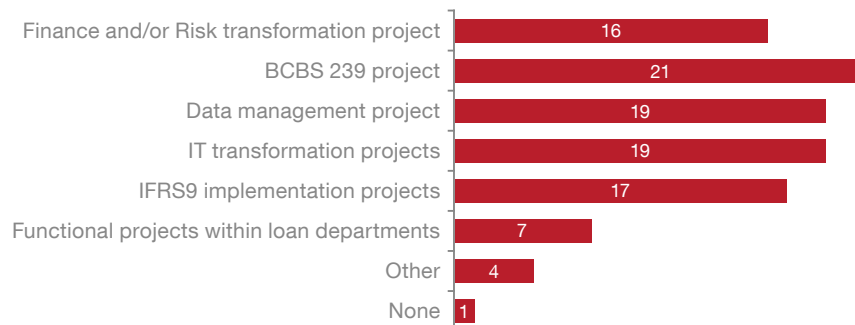
**Project stucture**

| | |
|---|---|
| Project only on group level (conglomerate) | 5 |
| Project only on single entity level | 11 |
| Joint project on group and single entity level | 12 |

35% of the AnaCredit projects are owned by or is the responsibility of the regulatory reporting department, followed by 25% of the risk- and loan departments.

In general, the requirements of AnaCredit are not implemented by a single project. Existing projects within banks are also involved in the implementation of the AnaCredit requirements.

**Other projects implementing AnaCredit requirements**

| | |
|---|---|
| Finance and/or Risk transformation project | 16 |
| BCBS 239 project | 21 |
| Data management project | 19 |
| IT transformation projects | 19 |
| IFRS9 implementation projects | 17 |
| Functional projects within loan departments | 7 |
| Other | 4 |
| None | 1 |

## *Planning*

The majority (two thirds) of banks plan to have the first full AnaCredit dataset ready before the end of 2017. A third of the banks push it to Q1 2018, when the first dataset should be ready for testing

# *Wide-spreading budget estimations among European Banks*

*The cost of implementing AnaCredit is estimated between 1 to 6 million Euro*

From our interviews as well as from our market experience we see wide-ranging AnaCredit budgets, from a couple of hundred thousand Euro (usually smaller, less complex banks) up to six million Euro and more (complex, international banks).

Around 40% of the banks participating estimate that the total costs for the whole AnaCredit project are less than 2 million Euro (covering both internal and external costs).

However, 50% of the responding banks have not yet made an estimation of the necessary budget.

*Observations on the budget estimations*

From our experience, complexity in terms of heterogeneity and variety of products, regions and IT systems is the budget's main driver rather than size, number of clients or lending volume of a bank.
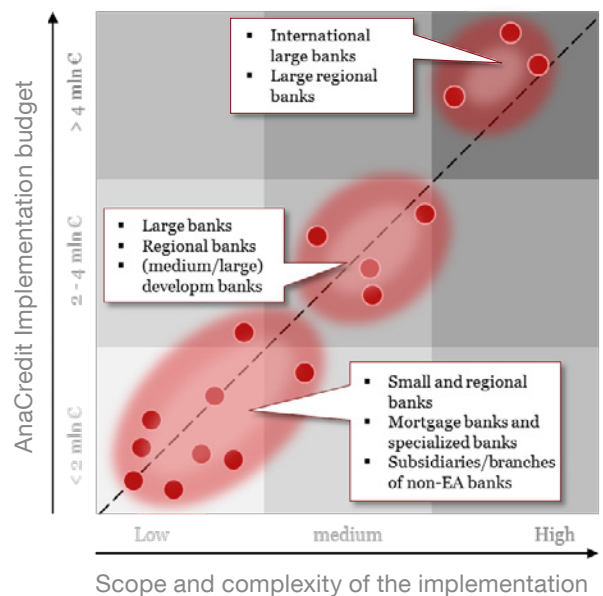
Banks usually prioritise and allocate their budget to:
1. Developing and implementing data warehouse/reporting solutions.
2. Gathering missing data.
3. Sourcing the data from source systems to data warehouse/reporting solution.

The reporting and process re-design as well as testing actions are less but still important cost factors while the estimated budget for project management plays a minor role.
Although it seems that the majority of the budget is allocated to IT-related actions, there is almost a 50/50 budget split between business and IT departments.



Budget versus complexity indications

- International large banks
- Large regional banks

- Large banks
- Regional banks
- (medium/large) developm banks

- Small and regional banks
- Mortgage banks and specialized banks
- Subsidiaries/branches of non-EA banks

AnaCredit Implementation budget — > 4 mln €, 2 - 4 mln €, < 2 mln €

Scope and complexity of the implementation — Low, medium, High

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## *Conclusions from PwC budget observations*

- **Smart project management** that identifies same data needs with other projects and manages risks actively enables an efficient and smooth AnaCredit implementation
- **A standard software for all statistical and supervisory reporting** might reduce the implementation costs due to higher efficiency and synergy effects.
- **Complexity is the main driver of the budget** rather than total assets or number of clients.
- Complexity of the implementation is determined by **heterogeneity and variety of the product portfolio** as well as the **IT architecture**.
- **Foreign branches in the Euro area** increase implementation costs due to different **national discretions and potential double reporting**.

# *PwC supports you with a proven approach and valuable expertise*

## 1. Strategy & Assessment

PwC will:
- identify the scope of AnaCredit for your institution: Identify what are the entities, the counterparties and instruments to report;
- assess the impacts of AnaCredit requirements on your organisation;
- identify the interactions between AnaCredit requirements and other relevant concurring regulations;
- perform a gap analysis on governance, data, policies, procedures, processes, controls, reporting and systems;
- help you to prepare for the supervisory usage of AnaCredit data
- supporting your ideas on how to turn AnaCredit into a strategic advantage for your organisation.

### PwC Credentials

- Track record of twelve AnaCredit-related projects;
- PwC performed workshops, published articles, and is in ongoing contact with national central banks on AnaCredit;
- Vivid AnaCredit expert team at PwC Europe;
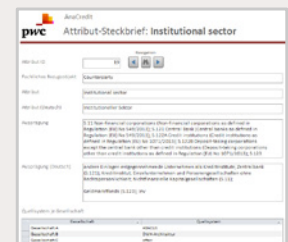- PwC-Testcenter for regulatory reporting.

## 2. Design

PwC will:
- design and validate a Target Operating Model based on the AnaCredit and NCB requirements;
- design of blueprint based on the AnaCredit requirements and based on the impact assessment;
- design the new governance, data model, procedures, controls and reporting;
- design the new IT target model and architecture incl. software selection process;
- prioritise the fields of action;
- elaborate the Roadmap with planning, milestones and key deliverables to  implement an AnaCredit compliant solution.

### PwC Credentials

PwC AnaCredit cockpit is the central management tool for an efficient and well documented AnaCredit pre-study and design.



Content:
- ECB list of attributes;
- definitions and discretions;
- requirements detailed by PwC experts;
- effort estimation for each attribute;
- A tracking of change requirements;
- documentation of technical data sources;
- FAQ functionality.

## 3. Implement

PwC will support with the implementation of the AnaCredit requirements based on impact assessment and gap analysis including changes in process, organisation, reporting and IT.

## 4. Test, Go Live & Stabilisation

PwC will:
- test and validate the AnaCredit processes;
- perform Quality Assurance;
- do acceptance testing;
- stabilise Process, Governance and systems following testing;
- perform data quality checks.

# *PwC Contactpersons*

**PwC Austria**
Georg Ogrinz
georg.ogrinz@at.pwc.com

**PwC Belgium**
Abdelmajid Lahrouchi
abdelmajid.lahrouchi@be.pwc.com

**PwC Cyprus**
Elina Christofides
elina.christofides@cy.pwc.com

**PwC France**
Romain Camus
romain.camus@fr.pwc.com

**PwC Germany**
Andrea Glatzel
andrea.glatzel@de.pwc.com

**PwC Greece**
Georgios Skoursis
georgios.skoursis@gr.pwc.com

**PwC Italy**
Andrea Baciarello
andrea.baciarello@it.pwc.com

**PwC Luxembourg**
Jean-Philippe Maes
jean-philippe.maes@lu.pwc.com

**PwC Portugal**
Luis Costa Ferreira
luis.costa.ferreira@pt.pwc.com

**PwC The Netherlands**
Sophie de Vries
sophie.de.vries@nl.pwc.com