MINISTRY OF AGRICULTURE

Supporting agricultural policy with cooperation and administrative data

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Cooperation between Ministry of Agriculture and Hungarian Central Statistical Office, integration of domestic policy data demand into data collections

Use of credit register data to replace data collection

Development of IT system related to CAP

Cooperation between Ministry of Agriculture and Hungarian Central Statistical Office,

integration of domestic policy data demand into data collections

Cooperation: integrated farm statistics (IFS)

Integration of policy demand

Ministry: coordination of consultations with stakeholders (chamber of agriculture, sectoral associations, public authorities, research institutes)

Review of questionnaire

Communication with farmers

Administrative data

Digitalization, precision agriculture

Generational renewal

Greenhouse

Organic agriculture

Fruit and vegetable sector

CAP strategic plan design

Sectoral analysis for policy interventions

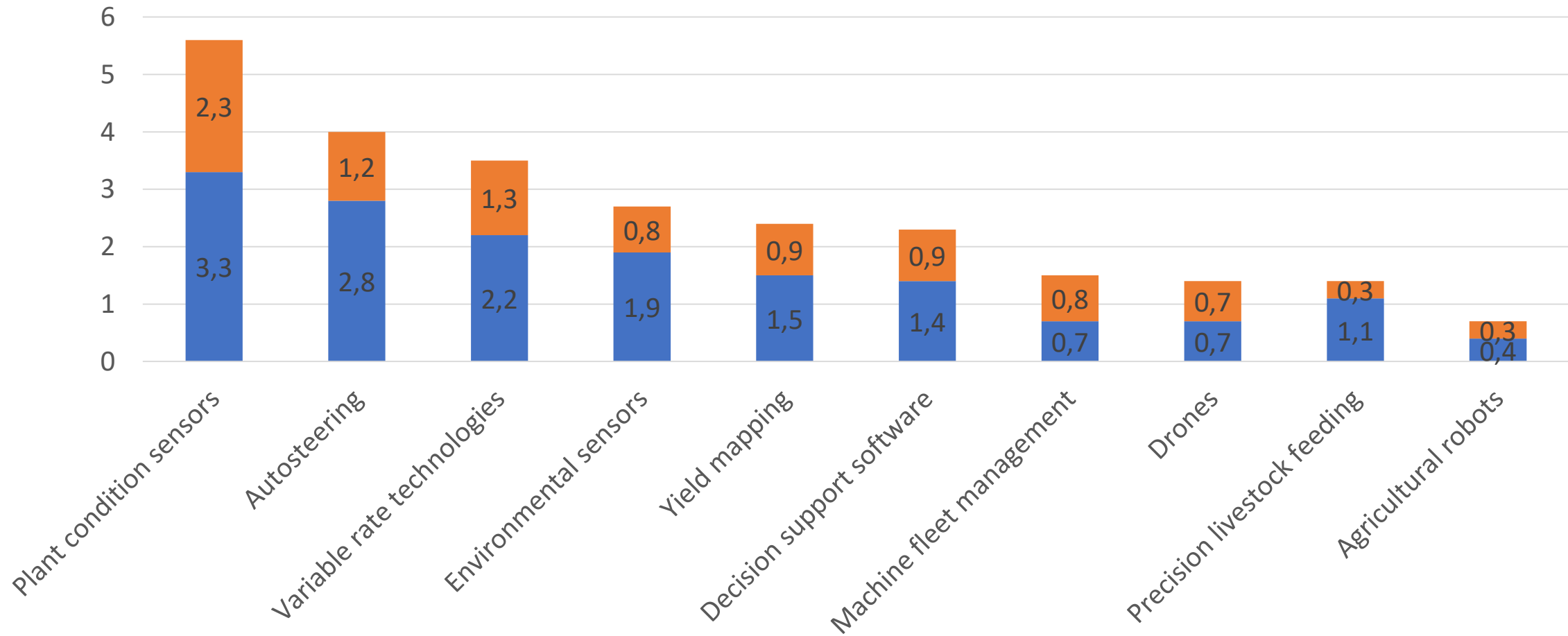Design of subsidies promoting precision agriculture

Law on farm take over

Strategy for generational renewal

Labour market support during covid

Sectoral programmes

Share of farms using precision agriculture devices in 2020 (%)

Source: HCSO, Agricultural Census 2020

■ Own device [%]　■ Service [%]

Use of precision agriculture devices according to SO size classes in 2020 (%)

Standard output size calss	Decision support software	Yield mapping	Machine fleet management	Autosteering	Variable rate technologies	Environmental sensors	Plant condition sensors	Precision livestock feeding	Agricultural robots		Drones
Without standard output	2	2	1	1	1	1	3	1		1	1
<4 000 euros	1	1	1	1	1	1	2	1		0	1
4 000–14 999 euros	2	2	1	2	3	2	6	1		1	1
15 000–99 999 euros	4	4	2	9	8	5	12	2		1	2
100 000–499 999 euros	10	11	9	32	20	13	19	4		2	7
500 000– euros	26	22	32	48	36	29	17	14		3	12

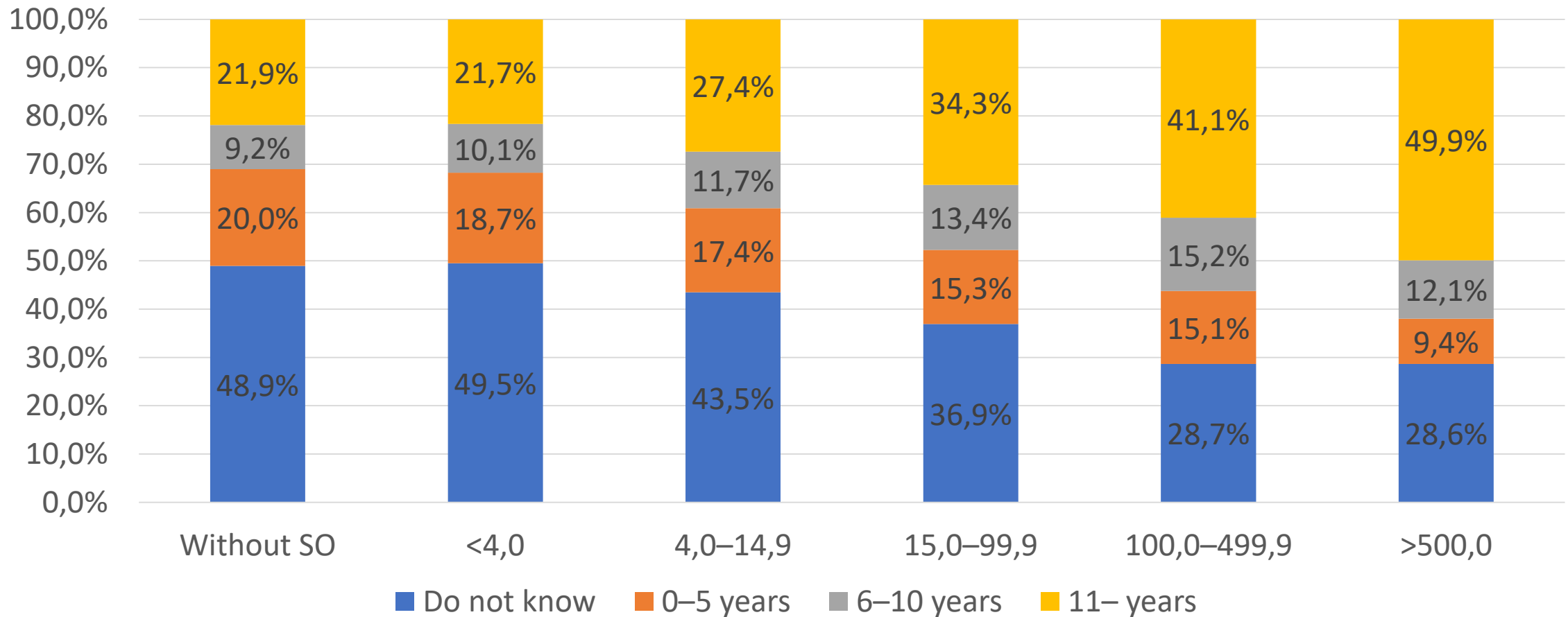Source: HCSO, Agricultural Census 2020

Use of precision agriculture devices according to farm types in 2020 (%)

	Decision support software	Yield mapping	Machine fleet management	Autosteering	Variable rate technologies	Environmental sensors	Plant condition sensors	Precision livestock feeding	Agricultural robots	Drones
Arable land	3	4	2	8	6	4	8	1	1	2
Horticulture	2	3	1	2	4	5	8	1	1	1
Plantations	2	2	1	1	2	3	7	0	0	1
Dairying, beef and sheep	2	2	2	2	2	2	3	4	1	1
Pig and pultry	1	1	1	1	1	1	1	2	0	1
Mixed cropping	3	3	1	4	5	3	7	2	1	2
Mixed animal husbanrdy	2	2	1	1	2	2	2	2	0	1

Source: HCSO, Agricultural Census 2020

Source: HCSO, Agricultural Census 2020

Legend: Do not know | 0–5 years | 6–10 years | 11– years

Size class	Do not know	0–5 years	6–10 years	11– years
Without SO	48,9%	20,0%	9,2%	21,9%
<4,0	49,5%	18,7%	10,1%	21,7%
4,0–14,9	43,5%	17,4%	11,7%	27,4%
15,0–99,9	36,9%	15,3%	13,4%	34,3%
100,0–499,9	28,7%	15,1%	15,2%	41,1%
>500,0	28,6%	9,4%	12,1%	49,9%

Share of farms according to age classes and generational renewal plans in 2020

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Age class	Do not know	Family member will take over, but I remain owner of the farm	Family member will take over ownership	Non family member will take over, I remain owner	Sell the farm but continue working as manager	Sell the farm, continue farming for self sufficiency	Sell the farm and give up farming
>65 years	49,8%	17,4%	23,8%	1,2%			6,8%
40–64 years	57,1%	18,3%	18,0%	1,4%			3,2%
<40 years	60,4%	22,1%	14,1%	0,7%			1,8%

Legend:
- ■ Do not know
- ■ Family member will take over, but I remain owner of the farm
- ■ Family member will take over ownership
- ■ Non family member will take over, I remain owner
- ■ Sell the farm but continue working as manager
- ■ Sell the farm, but continue working (non-manager)
- ■ Sell the farm, continue farming for self sufficiency
- ■ Sell the farm and give up farming

Source: HCSO, Agricultural Census 2020

Use of credit register data to replace data collection

Use of credit register data to replace data collection

Credit data collection since 2015, quarterly frequency, data providers: commercial banks

Central Bank of Hungary operates a register, commercial banks provide data on each credit contract, since 2020

Cooperation between Ministry, Institute of Agricultural Economics and CBH to use register data since 2020
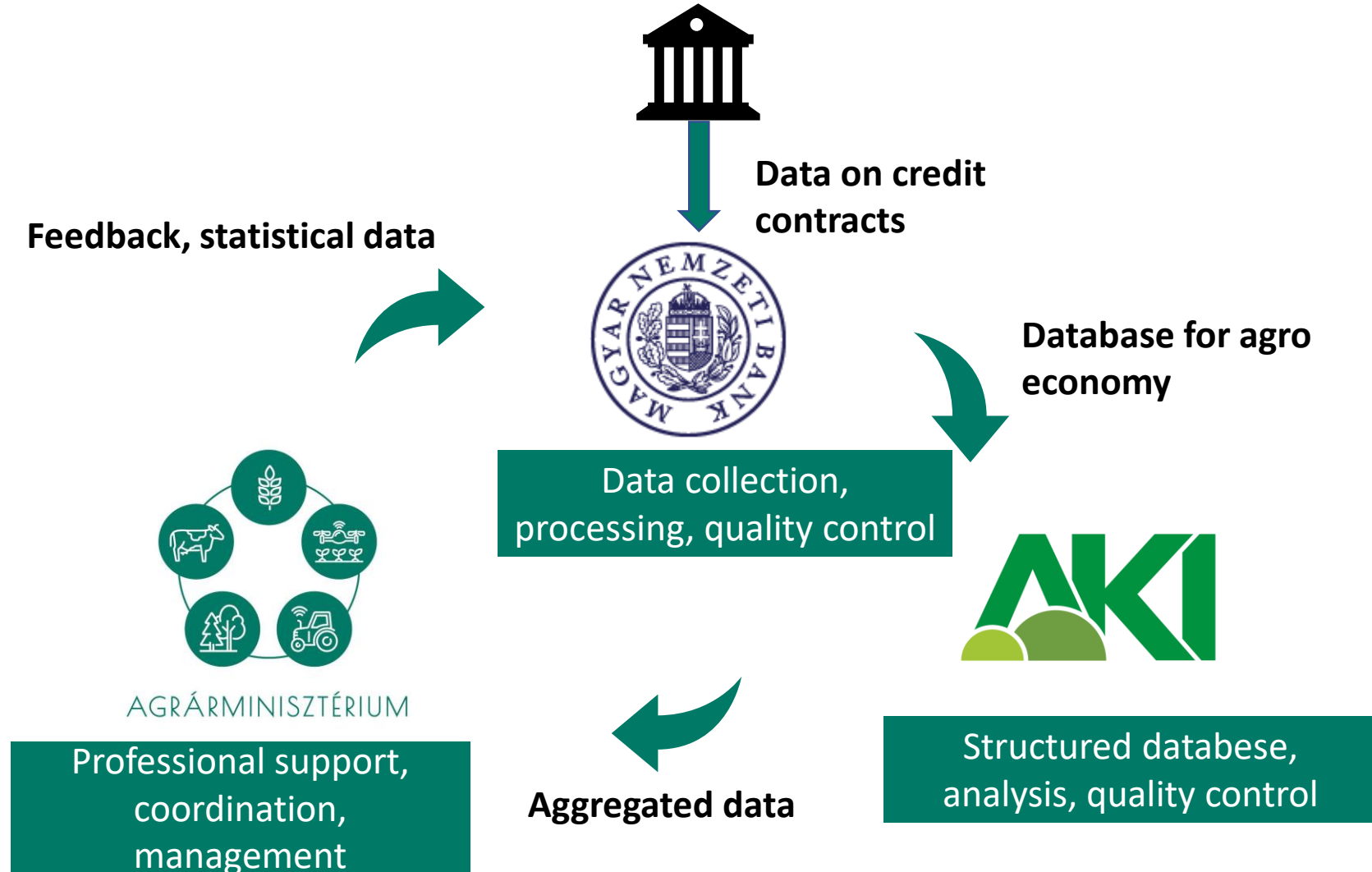
Objective: decrease administrative burden, more comprehensive data

Quarterly data provision

Data protection: individual data anonimous, only technical identifiers

Gradual improvement of data quality, extension of register data

Data on credit contracts

Feedback, statistical data

Database for agro economy

Data collection, processing, quality control

Structured databese, analysis, quality control

Professional support, coordination, management

Aggregated data

Credit register data: main data types

- Legal form
- Main activity (NACE)
- SME categories
- Credit attributes (objective, currency, market vs. subsidized loans)
- Stock and new lendings, number of enterprises
- Interest rate

Statistical data collection

- Credit stock and new lendings
- Aggregated data
- No data on credit size
- No data on credit duration
- Preferential loans total
- Main activity: predifined groups based on NACE08

Credit register

- Credit stock, new lendings, enterprise number, interest rate
- Micro data (credit contracts)
- Data on credit size and its distribution
- Data on credit duration available
- Detailed data on preferential loan schemes
- Main activity: detailed data NACE08 4 digit

Statistical vs. Credit register data in Q2 2023
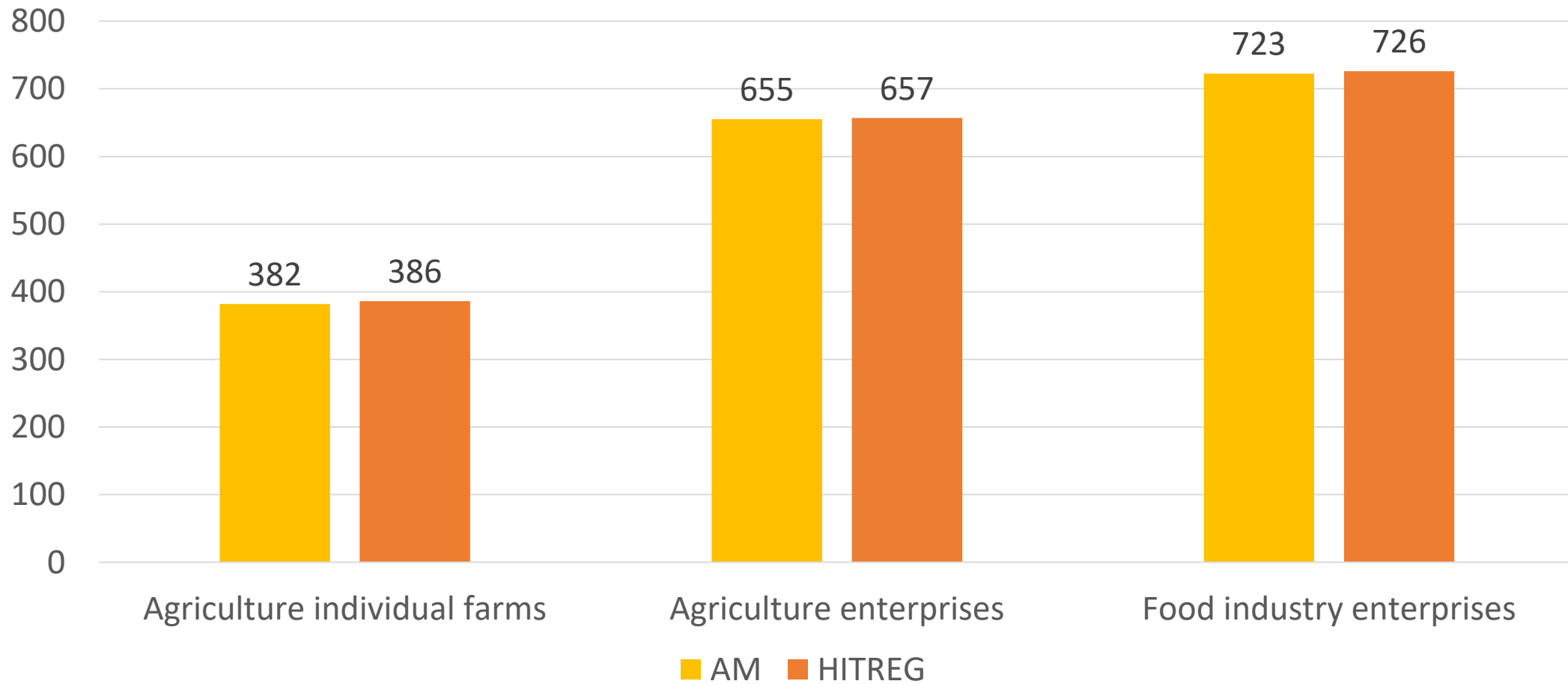
Source: Institute of Agricultural Economics based on Central Bank of Hungary, Ministry of Agriculture

Comparison of register and statistical data in Q2 2023, agricultural enterprises

	AM	HITREG	Difference
	Million HUF		
Arable land	237 330	230 599	-6 731
Animal husbandry	280 491	282 053	1 562
out of which poultry	87 335	87 009	-326
pig	94 676	95 295	619
cattle	90 477	92 320	1 843
Horticulture	47 198	46 883	-315
out of which vegetables	28 098	34 637	6 539
other	90 073	89 668	-405
Total	**655 092**	**656 746**	**1 654**

Source: Institute of Agricultural Economics based on Central Bank of Hungary, Ministry of Agriculture

Credit register data: experiences and outlook

Long project: use of administrative data demands time, iterative steps and good cooperation

Reduction of administrative burden: ministry will give up data collection in 2024

Wider range of data: much more attributes are available, more comprehensive picture on credit markets

Next steps: identification of data to be published, stakeholder consultations

Development of IT system related to CAP

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Objective: fulfil EU data provision obligations and meet domestic data needs

Data for Monitoring and evaluation

Implementation of CAP strategic plan

Evaluation, policy analysis, inform minister (executive data needs)

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Development of IT system related to CAP: data for analysis, executives

- Thematic working groups with stakeholders (e.g. ministry, paying agency, external experts)

- Identification of data needs and calculation methods

- Investment subsidies (mainly natural quantities, e.g. hectare of new greenhouse or piece of tractors)

- Classifications: SMEs, election districts, wine regions, farm type

- Data according to size categories of beneficiaries and of investment

Development of IT system related to CAP: data for analysis, executives

Categorization of investment: type: (e.g. machinery, building, plantation, renewable energy, IT), sub-type: e.g. building: greenhouse, storage, cold store…)

Capacity, technical parameters

CAP I. and II. pillar interventions categorized same way

Application: policy evaluation, analysis of agricultural investments, investment data production

Thank you for your attention!