



BUILDING A GROWTH-FRIENDLY TAX ENVIRONMENT

# Experiences of Tax Administration Digitalization

5 December 2023



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# Application of new information technology

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## BUILDING A GROWTH-FRIENDLY TAX ENVIRONMENT

## Available data

### Highly detailed & real-time data on transactions

online  
számlázó  
program

online  
számla

- ONLINE INVOICE
- ONLINE CASH REGISTERS
- eKÁER
- VAT ON IMPORTS
- ONLINE VENDING MACHINES



- Tax returns
- Audits
- Foreign & domestic authorities
- etc.

online számlázó program		e-SZÁMLA					
		Sorszám: 1-2022-85					
Eladó:				Vevő:			
Magyar adószám:				Magyar adószám:			
Bankszámlaszám:							
Fizetési mód: Átutalás	Teljesítés: 2022.12.30.	Keltezés: 2022.12.30.	Fizetési határidő: 2022.12.30.				
Pénznem: HUF	Teljesítési időszak: 2022.12.01.-2022.12.30.		Időszakonkénti elszámolás/fizetés				
Tétel neve	Mennyiség	Mennyiségi egység	Nettó egységár / Egységár / Adóalap	Áfakulcs	Áfa összege	Tételsor nettó érték	Ellenérték / Ellenérték áfával együtt
	1,00	Óra	10 000,00	AAM	0,00	10 000,00	10 000,00
<b>Számla összesítő:</b>							
Számla nettó értéke							10 000,00 HUF
Áfa százaléka és értéke							
AAM							0,00 HUF
Alanyi adómentes							
Áthárított áfa összege							0,00 HUF
Számla bruttó végösszege							10 000,00 HUF
							Fizetendő összeg: 10 000,00 HUF



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# Scope of risk analysis & data mining technologies

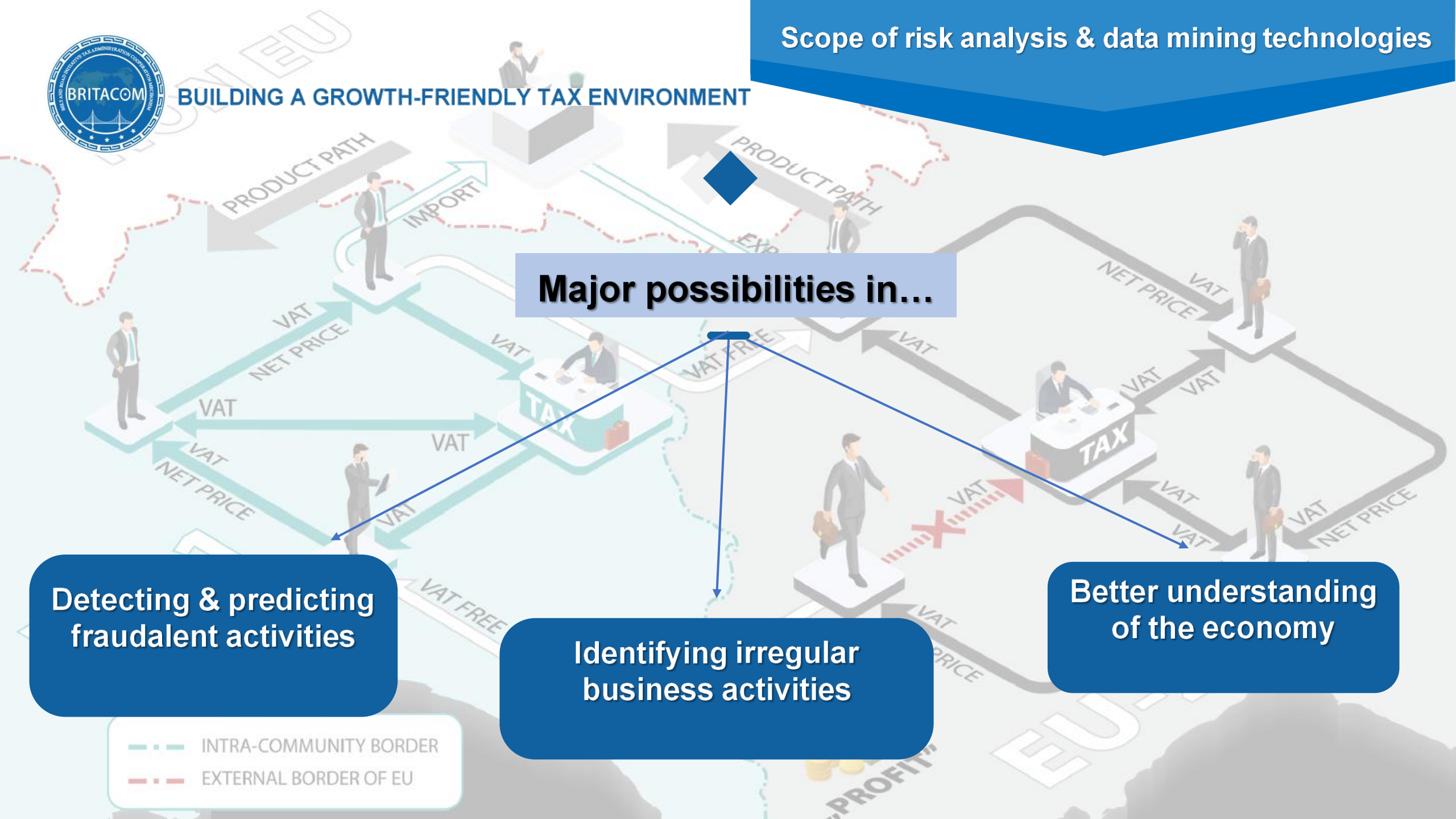
### Major possibilities in...

Detecting & predicting fraudulent activities

Identifying irregular business activities

Better understanding of the economy

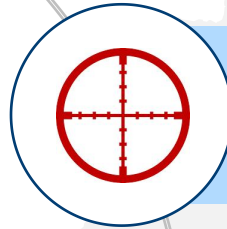
- INTRA-COMMUNITY BORDER
- EXTERNAL BORDER OF EU





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Statistical models

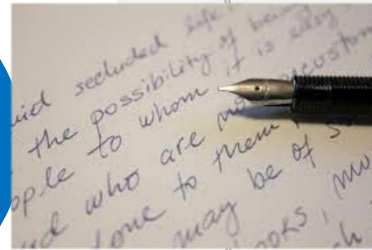


Models have varying accuracy, BUT still better than expert rules!

Implementing AI models



NAV



No current project on handwriting detection



Machine Vision / Computer Vision



asztása 2021.06.10...MBER.img

Width

2616

Height

1186

Depth(bit)

20



Focus size

Focus offset

Zoom

X Offset

Y Offset

AI solutions on **structured** data:

- selection for **on-site inspection**
- selection for **pre-disbursement VAT** control
- **segmentation of taxpayers** according to the level of compliance

AI solutions on **unstructured** data:

- entity extraction and networking based on the **free text information** of audit reports
- the **classification of product description on online receipt and online invoice** data



## Some upcoming plans

- analysis and visualization of **large-scale networks** (employee movement, account, network of company networks)
- calculation and publication of **complex risk values** based on real-time data
- **chatbot** supporting office (internal) work (IT support, professional support)
- **machine hearing**: customer service system audio recordings (transcription, sentiment analysis)





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Conclusion

**AI Models, compared to  
previous risk analysis  
technologies**

**Higher  
effectiveness**

**Narrowing the  
gap**



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NAV

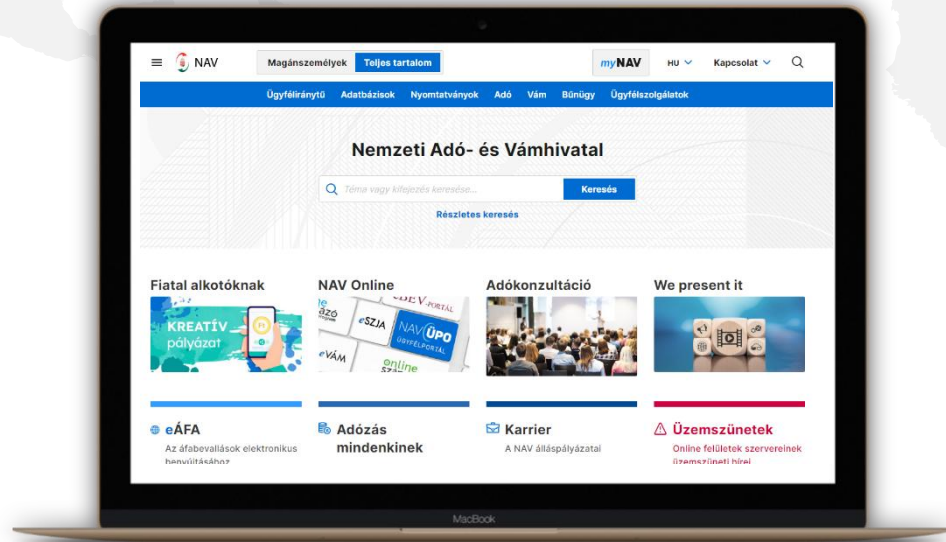
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**Thank you for your attention!**