Border traffic risk assessment

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Risk based border control in general and the station profiles of border crossing points (BCPs) in particular are based on those risk indicators that define the risks specific to the given border area. The risks – defined by these indicators – can be derived both from domestic or foreign sources and regarding their validity they may incorporate stable, but more frequently slowly or quickly changing components. Risk factors specified accordingly, serve as the basis to create the risk profile of BCPs and border sections, however they can inform regional or national risk analyses as well. The ultimate purpose of these profiles is to draft a comprehensive “risk landscape” for those border agencies that are facing these challenges in their area of competence. This article reviews the possible elements of such risk profiles and how these risks may be grouped. It will also focus on the advanced information systems and their role in risk reduction and trade facilitation by their positive impact on the BCPs’ permeability. The frequent revision of such profile provides up-to-date information about the border situation and at the same time, the deployment of resources available can respond to the risks gathered and analysed accordingly. If the border control is planned and arranged on a risk and intelligence based manner it will enhance efficiency while, in the same time increases permeability.

1. My relations to the topic

I compiled a training guide for the Moldovan Customs Service in 2006 in relation to the risk indicators of the border crossing points (BCP) and their assessment approaches within the frames of a training course. I worked with the EU Border Assistance Mission to Moldova and Ukraine (EUBAM) as a senior risk analysis adviser delegated to the Moldovan Customs. The objective in the background of the guide was to demonstrate techniques of risk based and selective border checks for the field customs officers. It had also importance to highlight if their resources are deployed on a risk based manner to the border control that increases the effectiveness through proper recognition and management of the risks.

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I handed over the guideline to my colleague who, as an experienced Hungarian border guard officer was delegated to the Moldovan Border Guard Service in the same position as I was at the customs. I asked him to go through the risks factors listed in the guideline and mark those having relevance for the border guards’ area of responsibility as well. Surprisingly, almost all risk factors were marked and just a few remained untouched from the border guard’s approach. We could also indicate the counterpart risk factors of certain organisation specific risks.1

Neither the guideline nor this article seeks to be exhaustive; the list of relevant risks may be completed according to other border agencies’ approach.

2. Definitions

For detailed analysis of the topic I think necessary to pay some attention for the definitions what I mean risk, profile, border control, border traffic control and border surveillance in this context.

2.1. Risk

Encyclopaedia of Military Sciences provides one of the possible interpretations of risks. The relevant entry says within the spheres of the security sciences that risk is “the combined extent of a chance of a negative event and the volume of its results.”2 David Vose, however gives the definition that “Risk is a random event that may possibly occur and, if it did occur would have a negative impact on the goals of the organisation.” (cf. opportunity, if it did occur, would have a positive impact on the goals.)3 Summing up these approaches I consider as risk that possibly happens and if it happens has negative impact on fulfilling their responsibilities of the border agencies. If we describe the occurrence as an opportunity, we consider the category of the risk as the lack of opportunity there.

2.2. Profile

The Scriptum GIB Electronic Explanatory Dictionary means profile as side-views and silhouettes of subjects, and in certain terminologies cross sections or shape of things and also, economic operators’ peculiar area of interests.4 We may need to be more specific here therefore I turned to the profiles used in the criminal investigations.

According to Marilyn B. Peterson, profile is “A psychological or criminal description of a suspect; the result of a criminal investigative analysis process.”5

Brent E. Turvey writes in the preface to the second edition of his book titled Criminal Profiling, An Introduction to behavioural Evidence Analysis that “Criminal
profiling is the process of investigating and examining criminal behaviour in order to help to identify the type of person responsible.” He also adds: “To identify something is not the same as to individuate something.”

Taking all of these considerations, I define BCP’s or a border section’s profile as an analyst product that collects and sums up the relevant risks in a specific manner. Risk profile refers to the real risk situation of a BCP or border section, however it is usually much more considered as a silhouette than a clear picture. In addition to that, a risk profile is constructed from the current risks already identified, therefore it needs to be regularly updated, to make sure it can be successfully applied for risk reduction at the border.

**Border control, border traffic control and border surveillance**

Border control, border traffic control and border surveillance are not synonym concepts. The check of passenger and commodity flow across the BCP i.e. border traffic control and also known as border checks, interacts with the border surveillance provided along the green and blue borders. The above-mentioned two activities – border traffic control and border surveillance – define border control. With other words, border control has two elements: border traffic control and border surveillance. This relationship arises when we draft a risk profile, because we need to consider the risks originating from the traffic crossing the border at the BCPs as well as the risks of the border surveillance in the region where the BCP is located.

I referred to “border traffic risk assessment” in the title of this article to indicate that I will focus on the risks of cross border traffic mainly, however as inseparable concept to this, I am going to touch also those originating from the green or blue border surveillance, because these are inseparable areas in this concern.

Finally, I will select one possible element of border control’s risk assessment and investigate further. This will be the circle of preliminary information systems as risk reduction means. According to my intentions the risk profile we draft here will allow to analyse the sum of the risks (see border control) and also separately (as per border traffic control (a.k.a. border checks) and border surveillance as they together are the elements of the total).

It is not in my intention here to make difference between the border agencies according to their role in the border protection when we assess the relevant risks. For instance, if we put a risk factor of forged documents into the profile, which in fact, has a very negative impact for any of the border agencies to reach their objectives, we will not consider which agency has more exposure on that certain risk. My goal is to collect and organise the probable risks in a possible system and demonstrate it from a joint point of view. This may also provide an opportunity to see the risks on an integrated
manner, highlighting at the same time the need of joint risk assessment and management as part of the integrated border management.8

Additionally, I would emphasise that risk profiles will work sometimes for longer, other times for shorter time frame, therefore regular revision and a cyclic re-development is needed.

The "System of border surveillance" chapter of the book titled "Enforcement and Protection of the State Border" discusses two approaches for characterising the state border that in fact, has fundamental influence on the system of border surveillance.9

Firstly, the approach of the military geography wants to answer the indispensable questions of modern warfare such as vulnerability and defensibility of border sections, objects in the border area having military relevance, traffic and shipping networks, opportunities to use of the infrastructure available in the border zone, and so on.

Although the border protection system is no longer military based in Hungary, I do not disregard the military geographic considerations. A good reason is that the military geographic approach excels in demonstration in certain group of risksii influencing the border control and especially its subset, the border surveillance seriously.10 Another good reason is that our objective is not to draft the border situation of Hungary, but to develop a collection of thoughts that might be used elsewhereiii for risk profile development purposes.11

Secondly, upon the above-referred military geographic assessment, the book gives further details on the possible elements for the analysis of the border surveillance. These are the factors indicating where the border section lies in relation to the main directions of international legal and/or illegal migration, cross-border organised crime; what sort of law enforcement and besides border guarding peculiars may be recognised; and how border guard’s – and in wider perspective – border agencies’ activity is influenced.

3. Border control’s risk profile and its elements

Let us see the possible elements of a border control’s risk profile collected into probable risk groups.

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iii By the selection of certain risk factors and also by their grouping I considered The National Strategy for Integrated Border Management of the Republic of Macedonia (FYROM) issued in Skopje, December 2003.
3.1. Geographic elements

General aspects
In this section we will analyse the character of the border from a military geography and defence point of view. We focus on the (military) geographic peculiarities such as defensibility and vulnerability of the border. We have such returning questions like direction, location, extent, quality and the relation of the state border with each factor. These factors have strong influence on the permeability of the border. The focus here is on the border’s natural relations: such as surface, terrain, type of soil, hydrography, regular and periodic vegetation (natural border obstacles, closed, partly open and open border) and similar dimensions.

Specific aspects
I suggest here to analyse human created details having geographic relevance in the risk pattern of the border. These may be built obstacles (barriers, fences, tracers/warning systems), traffic networks. It is a very significant risk if a BCP lies along a transit road (see Helsinki corridors), or the country may be considered as a transit country, or it lies in its proximity area. We may handle as a risk if there is an uncontrolled terrain/gap between the checkpoints of the opposite sides of the borders or there are illegal border crossings, paths, trails, fords nearby. In a geographic perspective we may estimate the amount of risks when our, or our neighbouring country is a source or a target area for commodity smuggling or even for migration.

Other geographic related issues
Although having strong geographic relevance these dimensions can be assessed in different ways. However in this concern I have sorted them as other geographic related issues. These may be the population, ethnic groups, urbanisation, economic situation, employment rate, literacy, education, and similar details and also the population’s attitude with law enforcement and border protection. We may add here the key objects of economic activities, and their relevant character to the border traffic. The military objects in the border area also have significance, the dislocation of armed forces and law enforcement agencies, their capability for manoeuvre and mobile operations in the region. Finally I list here the main directions of cross border crime and the border area; trends of illegal activity, methods, modi operandi, etc.

3.2. Traffic patterns
We analyse here the characteristics of the traffic in the border area. The intensity of traffic changes in time on different time frames: daily, weekly, monthly, a certain day of
a week, month etc. Does its character show peak segments, is it heavier or lover at certain times, are there periods of high or low flows and is the continuous permeability allowed? What is the primary means of traffic: cars, trucks or foot? Is there a significant “ant traffic”, which is a customs term for the pedestrians leaving the country, but not entering the neighbouring one; usually they buy duty free goods at the “no man’s land” and return to the country they left. Are there observable frequent changes in traffic patterns? Traffic comes from source areas and goes to target areas (cf. contraband, migrants) The means of transportation usually contain a single consignment to one importer or multiple consignments to many importers? Are there any border crossing and/or customs simplifications for the local population? Are there local exemptions from border checks?

3.3. Staff

Is BCP open for 24 hours a day on each day of the week (24/7) or limited to certain time frame? Is there any possibility to cross the border during non-business hours by traffic means or foot? Is there anyone from the staff at the border agency available for 24/7? Which of the agencies have continuous or only temporary/on call availability at the BCP? Is the staff sufficient to meet traffic patterns, and is it capable to follow traffic changes? Are there specialists e.g. rummage team, sniffer dog handlers, document specialist, crime forensic, etc.? Are the threats of corruption considered? What kind of peculiarities do they have and what sort of risk reduction means are they used?

3.4. Commodity flow

Do border crossing commodities and shipping means have opportunity to conceal contraband or individuals? Do packaging or containers allow concealments? Are there search difficulties because of the character of the cargo? (e.g. bulk cargo) Are there frequent perishable goods transports such as fruits and vegetables? Customs is often reluctant to search perishable transports not to cause delays and therefore damages for the shipping company. Can border agencies recognise goods that are not common at the BCP and at the border section?

3.5. Equipment and facilities

Is the BCP equipped with special sorts of contraband/migrant detection means? I consider this to be a key question, because of a variety of reasons. On the one hand this has key relevance, because cost effectiveness, risk analysis and long term planning, which are – according to my experiences – often ignored in this concern, especially in a donor – beneficiary situation. As Luc De Wulf and Omer Matityahu emphasised the
non-intrusive check means such as truck and container-scanning equipment can increase the number of consignments that receive customs attention without causing undue delay, and can identify illicit goods. The equipment requires a large capital outlay, however, and the process of introducing it, from conception through operation, affects the entire control and intelligence sectors and requires changes to the infrastructure and procedures of customs.\textsuperscript{iv} Often, beneficiaries expect ungrounded results from donated expensive equipment without developing the capabilities to integrate them into their own system either from the operational or from the organisational point of view.

Is there available an isolated area for secondary inspections/searches?\textsuperscript{v} Is there sufficient warehousing capacity available at the BCP or in close distance to store seized contraband and evidences taken? Is there any dedicated area for interviewing and to take the preliminary steps of criminal investigation? Is there any area for temporary custody that is safe enough and meets the relevant standards?

3.6. Documents

Are the border staff members aware of the commonly used documents, stamps and their security elements? Is the border staff committed for keeping records of forged documents identified/recognised in the region ("Docu-box") and is there any sort of reference collection of samples available at the BCP?

3.7. Local drug trends

Where are the major drug user areas in the country in relation to the BCP? Are drug prices going up or down or maybe stagnating? Prices strongly reflect on the supply of the market. What kinds of drugs are commonly used locally? Is the country a source? What kinds of drugs are produced in the country and in the neighbouring country? Type of drug will determine concealment and also search techniques. Number of addicts and overdoses indicates drugs availability and accessibility situation at the market. Such statistics will reliably reflect the situation.

\textsuperscript{iv} The authors also added that “in order to justify the outlay, and to ensure maximum return for the investment, it is necessary to ensure that scanning equipment is used effectively and that it is fully integrated into the risk assessment regime. The experience of customs administrations that currently use it suggests that planning for the equipment’s introduction should precede the purchase of the equipment. The acquisition of scanning equipment should be based on sound cost-benefit analysis. Costs include the capital, maintenance, and operational costs, while the benefits expected from the use of the scanner will depend on the specific objective for its introduction. Potential returns will, however, vary depending on the volume of traffic, its nature, and the assessed risk. For example, if the principal purpose is to control revenue, the overall value of traffic, the level of duty rates, and the projected level of misdeclaration are necessary components of the analysis.”

\textsuperscript{v} Secondary inspection is an detailed inspection and/or search based on the selection of the high risk passenger, cargo, or traffic means.
3.8. The neighbouring country’s enforcement activity

Maybe it sounds banality, but our law enforcement is strongly influenced by the neighbouring country’s law enforcement standards, their activity, commitment and intention for co-operation. The opening hours at the opposite side of the BCP are the same as ours?

Do they conduct export searches as well, or just focus on the import traffic? As Bryan Barton and his co-authors pointed out,12 “governments usually have separate and unequal processes for managing exports and imports. The high priority given export facilitation often results in reduced controls at departure. With clear revenue and security incentives to control incoming cargo, imports are more rigorously managed. Risk assessment for import cargo release is commonly performed after goods arrive at their port of entry”.vi

Is the neighbouring country’s law enforcement committed in exchange of information? Does this mean detailed information on seizures and/or intelligence on a regular basis – do they exchange liaison officers, establish contact points, create hot-line and do they develop similar means in order to make the co-operation smoother?

Are there large amounts of contraband to be stockpiled or migrant reception centres on the other side in the proximity? If yes, what sort of arrangements did they do respectively? Are there joint operations, patrols and investigations with the neighbouring country? Are there any results that may have an impact on the criminal situation?

3.9. Border control at our side

A complex analysis, preferably SWOT analysis is needed from our capabilities to identify gaps and capacities to be developed. What types of searches do we conduct – cursory/complete, checks: administrative, random sample, detailed rummage? What are the percentages of types of searches, searched cargo, vehicle and passengers? May passengers leave the vehicle while searched? Do we search the person and their luggage, vehicle and cargo in the same time? Do we conduct background checks on operators, companies, shipping agents etc.? Are there questions directed to the

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vi The authors also emphasised that the changes were encouraged by the World Customs Organisation (WCO). Leading nations are adopting a different perspective: instead of viewing cargo movement as discrete departure and arrival transactions, they see it as an end-to-end, integrated process from point of manufacture to final delivery destination. Sometimes referred to as an “elastic border” model, customs in the arrival country expands its formal control horizon beyond physical borders – back to the shipment’s origin and forward to the ultimate delivery location. To facilitate this sort of international and public/private sector integration, the WCO has established standards for mutual recognition, certification and risk management. (The elastic border model depends on regular and reliable preliminary information supply that will have a focus at the final third of this article.)
operator/passenger for selectivity purposes? Do we keep records on seizures, analyses on smuggling trends and methods? Do we develop risk indicators, profiles of suspect smugglers or concealment methods? Is the know-how and current intelligence disseminated during regular trainings?

3.10. Border traffic control – passengers, goods and companies

Preliminary inspections

We have already touched different forms of control. At this section we will focus on the preliminary inspections and also the preliminary information on which the inspections may be based on. These would cover the background checks that would touch all companies, shipping agents, operators, travel agencies being frequent at our BCP and our border section. Do we receive preliminary information on passengers/goods or any of the above-mentioned entities are willing to supply us with? Is mandatory to send preliminary data expectations for risk analysis from the law enforcement? Do border authorities use records of violations and are they used for preliminary assessments? Are there risk indicators and profiles developed for preliminary inspections? Disseminations of indicators and profiles (regular information exchange and training): is there a regular procedure? Is there a common (routine) information exchange on risk profiles, detection techniques, records in intra-agency, inter-agency, international scenes?

4. Preliminary information as element of the risk profile

At the border traffic control and the control of the cross-border commodity flow we mentioned the role of the preliminary inspections and in case of availability its quality as risk influencing factor. The role of the preliminary information services is to supply early warning information concerning such relevant risk factors like the passengers, commodities, traffic means, the economic operators respectively, routing, sealing of traffic means etc. The preliminary information is the input data for background checks and other forms of risk analyses that will support decision-making concerning what sort of entry check do we conduct upon arrival. It is also a strong advantage that the preliminary information may be used for traffic organisation purposes at the BCP, because that would somehow precisely indicate in advance how the traffic load will occur. Border agencies may estimate which vehicle is expected approximately when and based on a preliminary risk assessment and decision-making they can arrange the necessary capacities for border crossing; they can alert phyto-sanitary inspectors, sniffer dogs, rummage teams and so on, if needed.
As many security related means, preliminary information systems gained a strong priority upon 11 September 2001 that led to general reforms and even a paradigm shift. In maritime shipping the 24-hours-rule became general. Ports can analyse the advance report of cargo manifest records required as a condition for the entry of the vessels.

The USA launched their Container Security Initiative (CSI) and C-TPAT programmes that strengthened the co-operation between the shipping industry and the port authorities and besides the Customs, by which they could significantly enhance the security. Under the CSI programme, the USA authorities erected American checkpoints to the most frequent foreign ports where from which the sea-born cargo is sent to American soil. The checkpoints conducted non-intrusive and if needed deep searches in the cargo containers prior to they reached the boards of the ships. CSI started to work not just as preliminary information service in 2003, but created an “elastic border” situation in the control of the trade supply chain by transporting some part of the checks to the previous chain over the horizon.13

C-TPAT programme set the condition of providing preliminary data voluntarily and other forms of co-operation as well as transparency from the private sector. As an exchange border authorities provide “low risk status” for the company that leads to simplified border procedures and formalities and in fact facilitates merchant traffic.14

European Union has a similar programme, called Authorized Economic Operator (AEO).

I used to work with the European Commission’s Customs and Fiscal Assistance Office (CAFAO) programme in Serbia as a senior risk analysis adviser for the inland waterways from 2004. We analysed the situation with our counterpart agency, the Customs Administration of Serbia. We found the gap that port authorities in the whole length of the Serbian section of the River Danube are unable to recognise the vessels operating, just long time after they already arrived to the ports. These authorities started to work with a given vessel and its cargo upon its arrival that necessarily lead to a waste of time without having any sort of impact on the security situation. In the same time they had very little, if any information on the river traffic operating between the ports. I had to develop a means that can resolve the problem and increases the security while it facilitates the traffic by reducing the unnecessary waste of time at the ports. We invited two neighbouring countries along the river and started a pilot project with the Croatian and the Hungarian Customs in the area of Mohács, Bezdan and Vukovar in 2005. The ports’ front line customs officers started to share basic preliminary information on the departing vessels by using the system called DREWS that stands for Danube River Early Warning System.
The information was provided for the ports of arrival often hours before a certain vessel would arrive. So the risk analysis, decision and traffic organisation steps could have been made in advance that increased the flow of traffic by reducing the time being held up at the ports. Later on, an information chain was installed that proved the idea. My former colleagues have further developed the system on the idea since, and now they have an early warning system that works at road and rail as well as in the field of deep sea traffic.

DREWS project was promoted by the EU CARDS IBM Strategy Team leader as a perfect example of the real application of Integrated Border Management in the Balkans and also was mentioned as a good practice in the IBM Guidelines in the Western Balkans and in the EU Danube Region Strategy paper.

The system SEED is now in use in many countries under the support of the EU and an experienced development team. The EU has promoted the preliminary information systems as trade facilitation procedure that can in the same time reduce border-crossing risks. The core part of the procedure is that preliminary information is disseminated from the starting point at the inland customs stations to the border’s departure side, then its arrival side towards to the inland customs house of arrival. The system automatically collects the relevant data fields, disseminates with the next station and also compares them with the previous station’s records. This provides the preliminary data for risk analysis and decision-making and at the same time, it gives alert if the data were changed since the previous step by highlighting the data fields with changed entries.

Very recently I have been involved in an integrated border management project for Turkey with my expert colleagues, in which we have suggested that all border agencies should have access to such preliminary information and should start using it at inland customs stations and at the border as well. We expect, that this system will significantly decrease the workload of all border agencies, it will be easier to plan the resources and last but not least it will increase the general efficiency of the system. All of these will have a positive impact on the border security while the permeability of the borders will also be increased. In fact, achieving both of them is the main objective of our efforts.

5. Summary

We have browsed elements of a possible risk profile developed on the border crossing traffic and also how its risks components may be grouped. We have seen that advanced

Systematic Electronic Exchange of Data.
information systems may be vital in risk reduction and trade facilitation by their positive impact on the BCPs’ permeability. On the other hand, risk management operates on a cyclic intelligence-led manner, so there a frequent revision of such profile is essential to gain proper and up-to-date information about the border situation. It the same time, the deployment of resources available can respond to the risks gathered and analysed accordingly. For the border management it has been proven that such intelligence-led and risk based models are suitable means in the increase of the efficiency of border control.

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References

C. ZÁGON: Border traffic risk assessment

18. Further reading at the official site of the EU’s SEED Project see: http://www.eu-seed.net