

## **Assisting International Justice Systems with the Cyber Component of Modern Conflict Situations:**

“Finding International Legal Standards for Digital Evidence”

Updated version – 11 July 2019

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### **I. Background**

The digital revolution has produced technologies, such as satellite imagery, social media, and big data analytics, that provide new information about atrocities committed in conflict zones. These digital tools can assist international accountability mechanisms - encompassing *international and national criminal courts* as well as *fact finding bodies* (like e.g. the *International Humanitarian Fact Finding Commission* under Article 90 API or *UN Commissions of Inquiry*) – in pursuing legal accountability for atrocities committed in conflicts. The fact that modern conflict is increasingly conducted using, and is influenced by, digital and cyber technologies provides a unique opportunity to harness these technologies for accountability purposes.

Recent developments provide a number of examples: in relation to Myanmar, the UN Office of the High Commissioner for Human Rights (OHCHR) used satellite imagery to document the systematic burning of Rohingya villages; in relation to Libya, the International Criminal Court (ICC) charged a defendant with war crimes based on social media videos; and in a trial before the Special Tribunal for Lebanon (STL), big data was used to establish connections between alleged perpetrators.

The increasing presence of digital technologies in conflict areas leaves behind a trail of digital breadcrumbs that can be used to pursue accountability for international crimes. This trail may be deliberately left behind – such as when an individual records a potential crime on their phone and uploads it to social media – or left behind inadvertently – such as when the GPS data on the mobile phones demonstrates large scale population displacement. However created, the trail of digital traces can provide much needed evidence for international accountability mechanisms investigating and prosecuting international crimes.

While technical expertise in the use of digital technologies is growing, both within international accountability mechanisms and among civil society actors seeking to support these mechanisms, research on the associated legal questions is lacking. In particular, questions concerning how the differing evidence regimes of various international accountability fora can accommodate digitally derived evidence remain open.

## II. Legal Questions

Understanding how digitally derived evidence can be accommodated across the legal regimes of different international accountability fora is complicated by two legal challenges. The first is that different international criminal justice mechanisms employ *different evidentiary requirements and standards of proof* depending on whether they are fact-finding bodies, semi-judicial institutions, or (international) criminal courts. Even within these categories there can be divergences: for example, a UN human rights fact-finding mission may employ different standards than the *International Humanitarian Fact-Finding Commission (IHFFC)* under Article 90 API. This challenge is compounded by a second, namely the lack of international legal rules for the collection, preservation, and sharing of digital evidence. The modern character of digitally derived evidence means that little guidance is available, both for international accountability mechanisms and for civil society actors, regarding how to approach it.

Despite a steadily growing amount of practice of international accountability mechanisms using digitally derived evidence, there is still little indication of how such evidence fits within different evidentiary standards. The OHCHR Fact Finding Mission on Myanmar made extensive use of digitally derived evidence in its September 2018 report concerning violence against Rohingya Muslims and other ethnic groups. The Mission's Report uses satellite images to show the destruction of villages and uses Facebook posts by the Myanmar military to make findings concerning the military's activities. Furthermore, Facebook posts are cited to support the finding that the military leadership in Myanmar possessed genocidal intent with respect to the killing and forced displacement of the Rohingya population. The Mission makes clear at the outset of the report that the standard of proof to which it is working is that of 'reasonable grounds' but does not detail the specific requirements for digitally derived evidence to meet this standard. The same is true in relation to the arrest warrant issued by the ICC for the suspect Al-Werfalli. The standard of proof for an ICC arrest warrant is reasonable grounds to believe, but the text of the warrant does not indicate how the social media videos on which the warrant is largely based were deemed to comply with this standard. Furthermore, the question remains open whether, in light of the standard of proof for both the Fact-Finding Mission and ICC arrest warrant being worded similarly, the standards of proof for the respective mechanisms is equivalent or broadly different.

Given the complexities of digitally derived evidence - in terms of provenance, verifiability, and susceptibility to manipulation - additional information is needed to understand how it will be approached by different accountability mechanisms, and how the different legal standards of those mechanisms may impact how the digitally derived evidence is treated and used.

The lack of research surrounding digitally derived evidence and the different legal standards of international accountability mechanisms leads to two problems. First, actors working within these international accountability mechanisms may not fully understand the appropriate weight and value to give digitally derived evidence in light of their own legal framework. Second, different

international accountability actors working on the same conflict situation may be unsure how the digitally derived evidence obtained and analysed by one can be of use for the other. For example, the UN Commission of Inquiry for Syria has been collecting evidence, including digitally derived evidence, since 2011. This evidence is now to be shared with the Syria International, Impartial and Independent Mechanism (IIIM), a body whose mandate is much more focused on criminal accountability than the Commission of Inquiry's. Third, the accessibility and affordability of digital technologies in conflict has led to a proliferation of civil society actors working on accountability for atrocities. Examples of such actors include the group of investigative journalists 'Bellingcat', the legal accountability NGO 'CIJA' and the archiving NGO 'Syrian Archive'. The work of these civil society actors is key in supporting the work of international accountability actors. However, in order to be effective in their support, civil society actors must adhere to the standards of evidence that will ensure that the digitally derived evidence they collect can be used by international accountability actors in their work.

### III. Proposed Research

An examination of the different legal standards of evidence applicable at various international accountability fora is crucial to ensuring that the potential presented by digitally derived evidence for accountability efforts is met, while at the same time ensuring that the dangers presented by this evidence is avoided.

#### A. Position in Relation to Current Research Activities in the Field

There is significant work being done in this area which the proposed research project would complement but not duplicate. At the University of California at Berkeley, researchers at the Human Rights Centre are putting together a protocol on the use of open source material in criminal prosecutions, for use by judges and practitioners. The aim of the researchers in putting together this protocol is to create a set of guidelines that enable practitioners to understand the relative value of different open source materials, and to set out what to take into account when assessing the weight of material. The protocol is designed to be appropriate and applicable across a wide range of legal systems, both international and domestic. As such, it is not tied to particular evidentiary standards in particular fora.

Our proposed research at Leiden would *form a bridge* between the practical protocol being developed by colleagues at Berkeley, and the concrete legal standards that must be complied with in specific international accountability fora, such as at the International Criminal Court (ICC), the Special Tribunal for Lebanon (STL), the Syria International, Impartial and Independent Mechanism (IIIM), and the International Humanitarian Fact Finding Commission (IHFFC). Furthermore, while the Berkeley protocol focuses only on open source material, our proposed research is more broadly focused on digitally derived evidence (which includes closed source material).

Preparations are under way for further research in this area to be undertaken by a consortium of partners coordinated by the International Nuremberg Principles Academy. We have been in close contact with the Academy, and are in the process of establishing how the project undertaken at Leiden can play a part in and complement the project coordinated by the Academy. The memorandum of understanding in place between Leiden and the Academy facilitates this close cooperation. That being said, the project outlined in this present proposal remains broader than that planned by the Academy, as their focus remains on criminal law, whilst the focus of this project includes in addition human rights and international humanitarian law fact finding. As such, these are accountability fora that would be addressed specifically at Leiden.

The Leiden research project would therefore *fill an important gap* in the research currently being undertaken at the institutions active in this area of work. In particular, there is no project aiming to provide a comparative overview and analysis of how different the evidentiary standards applicable at different accountability fora can accommodate the growing body of digitally derived evidence of atrocities.

## **B. Research Approach**

The approach to the proposed research will aim to capitalise on the broad intellectual resources available at Leiden Law School. A combination of staff and students will work together in a collaborative effort to conduct high quality research exploring how digitally derived evidence needs to be handled and treated in order to meet the different evidentiary standards of the different accountability fora.

Individual researchers will lead, coordinate and supervise this collaborative effort, conducting substantive research and trainings that will inform and guide the direction of the student-led component of the research. Students will then further elaborate on, and workshop the developed ideas, putting them into practice - subject to a feedback loop from their peers and supervisors.

These students, sourced from the LL.M. programme in Public International Law offered at Leiden Law School, including those taking part in the KGF's IHL Clinic, will be selected based on their academic performance, interest and relevant skills.

This approach to the research will build on previous experiences, among Leiden staff members, supervising projects of the Leiden IHL Clinic related to innovation and technology, such as the 2017 'IHL Twitter monitor' project in cooperation with Humanity X (Centre for Innovation), the 2018 project 'Towards a Responsible Approach to Data', and the ongoing 'IHL in Action: Respect for the Law on the Battlefield' project with the ICRC, focused on updating their online IHL database.

### C. Research Infrastructure

The research project will make use of the expertise and infrastructure of both the [Kalshoven-Gieskes Forum on International Humanitarian Law](#) as well as the [Grotius Centre for International Legal Studies](#) at Leiden University. At the same time, the research will be conducted in close cooperation with the Leiden Centre For Innovation and its [HumanityX](#) platform, a leading institution in the area of providing digital tools for humanitarian actors.

### D. Research Timeline

The proposed research will take a total of ten months and is scheduled to take place *between 1 September 2019 and 30 June 2020*. The timeline below, divided into three phases, explains the exact distribution of time according to the required activities.

The initial three months - 'Phase I' - will be focused on setting the relevant framework for the whole research project, such as choosing the students and dividing them into teams, as well as setting the initial research and training agenda. The next four months, 'Phase II', is allocated to the core of the research, namely looking at core case studies and discussing operational considerations with practitioners. The last three months - 'phase III' - are focused on the final component of the research project, namely the compilation and completion of the outputs as described above.

2019-2020	Sept	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	June
<b>Activities</b>	<b>Phase I</b>		<b>Phase II</b>				<b>Phase III</b>			
Setting up infrastructure	■									
Initial research	■	■								
Initial training	■	■								
Coordinating with partners			■	■						
Main research			■	■	■	■				
Examining Case Studies				■	■	■				
Contact with Practitioners				■	■	■				
2 Day Expert Workshop							■			
Compiling Outputs								■	■	
Launch of Website										■

## E. Research Output

There will be three principal outputs to this research:

1. *Foundational Research on the different applicable legal standards and how they can accommodate digital derived evidence (Academic output)*

Individual researchers will: a) publish academic publications on the research in an effort to disseminate knowledge and bolster the emerging discipline focused on digitally derived evidence; and b) publish a commentary on the guidelines that will be produced in the course of the research project.

2. *Guidelines on how the evidentiary standards of different international accountability mechanisms apply to digitally derived evidence to be published on the website (Practical output)*

This output will be the primary focus of the student-led contingent of the research project. The individual researchers will supervise and coordinate the team of students in drafting guidelines on the crucial question of how the evidentiary standards of different international accountability mechanisms apply to digitally derived evidence. In order to disseminate the guidelines, as well as the foundation research and commentary, in the most efficient way and simple way, a website will be set up to serve as a platform for their use. The website will also serve as a platform for cooperation with our partners in order to connect our research to their work.

3. *Blueprint for a proposed interactive online manual (Future output)*

This output is a long-term goal focused on the development of an interactive online manual on 'International Legal Standards for Digital Evidence'. Our proposed manual will work in a similar manner as the ICRC's IHL Customary Law Database model. It will outline and present the core legal rules related to digitally derived evidence in a fixed user-friendly database – which can be downloaded separately to use offline – while presenting the practice that is linked to digitally derived evidence in a more fluid manner subject to constant updates in order to keep up with developments.

## IV. Provisional Budget

The budget, as presented below is allocated to four expenses crucial to the proper functioning and execution of the research project. The primary expense is the hiring of a part-time Research and Teaching Associate for a ten-month period. The Research and Teaching Associate is tasked with supporting the management and coordination of the research project in close cooperation with the senior researchers and supervising the day-to-day activities of the student teams. Additionally, among other tasks, the Research and Teaching Associate will contribute to the first output by publishing academic publications and helping to draft the commentary to the guidelines.

The expense titled ‘Workshop’ will cover all the necessary costs linked to a two-day expert workshop that will be held in December, at the end of the research cycle. The aim of this workshop is to gather practitioners from relevant accountability fora, as well as other experts, to discuss the research and its guidelines.

In addition, expenses are foreseen for research visits to Geneva and the locations of possible cooperation partners, as well as general expenses for the infrastructure and overhead costs of the project (please see also attached excel sheet with detailed expenses).

<b>Expense</b>	<b>Cost</b>
Research and Teaching Associate (0.8 fte)	30,947 Euros
Overhead Costs	7,875 Euros
Workshop (2 days)	4,848 Euros
Research Related Travel	1,330 Euros
<b>Total</b>	<b>45,000 Euros</b>

#### V. Contact:

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