

South Africa

Tafadzwa Brian Mukwende, Diversity and Inclusion Officer, Phathi Trust, South Africa

1) What is the understanding or definition of AI in your jurisdiction?

Dating as far back as closed-circuit television, justice was born into the digital age. In modern times, even the law must protect itself from itself in order to be a better version of neatly crafted rules of modern societal fashion. Keeping up with digital trends technology advancements is top priority. In the case of *H v W* 2013 (2) SA 530 (GSJ); [2013] 2 All SA 218 (GSJ), Judge Nigel Willis had this to say:

‘The law has to take into account changing realities not only technologically but also socially or else it will lose credibility in the eyes of the people. Without credibility, law loses legitimacy. If law loses legitimacy, it loses acceptance. If it loses acceptance, it loses obedience. It is imperative that the courts respond appropriately to changing times, acting cautiously and with wisdom.’

In essence, artificial intelligence is virtually part and parcel of the judicial transformative process agenda for the future efficacy of court systems. AI is a constellation of technologies designed to adapt over time through machine learning processes that enable highly intelligent machine prompted responses with augmented automated capabilities in any given environment.²³⁶

Virtual courtrooms are the new colour television of our times where the judge not only enters our sitting rooms, lounges and private spaces but the gavel strikes close to the smart phone via an app better known as digital caselining. One would say justice has not only managed to put on its shoes but also found its speed.

2) In your jurisdiction, besides legal tech tools (ie, law firm or claim management, data platforms etc), are there already actual AI tools or use cases in practice for legal services?

In South Africa, there are diverse electronic legal resources, e-libraries and AI tools through which law professionals and any other person may access legal information on past, present and latest judicial precedents. By the push of a button on any one of the e-databases below, information is available:

- Bargaining council agreements: https://discover.sabinet.co.za/bargaining_councils

²³⁶ Access Partnership, *Artificial Intelligence for Africa: An Opportunity for Growth, Development and Democratisation*. South Africa: University of Pretoria (2017) p 4.

- Bill tracker: https://discover.sabinet.co.za/bill_tracker
- Government gazettes: http://discover.sabinet.co.za/government_gazettes
- Jutastat: <https://jutastat.juta.co.za>
- Municipality bylaws: http://discover.sabinet.co.za/municipal_by_laws
- My Lexis Nexis: www.mylexisnexis.co.za NetLaw – Provincial: https://discover.sabinet.co.za/provincial_netlaw
- NetLaw – SA Legislation: <http://discover.sabinet.co.za/netlaw>
- Parliamentary documents: https://discover.sabinet.co.za/policy_documents
- Potchefstroom Electronic Law Journal: <https://journals.assaf.org.za> or <https://law.nwu.ac.za>
- Pretoria University Law Press – De Jure Law Journal: www.pilp.up.ac.za Provincial gazettes: http://discover.sabinet.co.za/provincial_gazettes Retrospective government gazettes: http://discover.sabinet.co.za/rgg_gazettes
- Retrospective provincial gazettes: https://discover.sabinet.co.za/retrospective_provincial_gazettes SA journals – law: www.journals.co.za
- Sabinet – labour judgments: https://discover.sabinet.co.za/sabinet_labour_judgements
- Sabinet – reference: <https://reference.sabinet.co.za>
- SA Media: https://reference.sabinet.co.za/sa_media
- South African Legal Information Institute: www.saflii.org

The downside is that some of these specialised databases require membership subscriptions beyond the reach of many in order to gain access to case law, legislation and law journal publications.

3) If yes, are these AI tools different for independent law firms, international law firms and in-house counsel, and what are these differences?

International legal resources contain a matrix of sources of law, law journal publications, e-books, e-library features and archives of court records spanning for centuries of large law collection. Popular international legal resources include:

- Lexis Nexis International: <https://solutions.nexis.com/doj>
- HeinOnline: www.heinonline.org
- Index to Legal Periodicals: <http://vnweb.hwwilsonweb.com/hww/jumpstart.jhtml>

Vast differences may arise as a matter of affordability and access to AI tools where bigger international law firms are better positioned than small and medium-sized independent law firms. Subscription fees and cost of technology are the impediments to the use of AI and access to AI tools on these specialised law databases. Local databases are not as sophisticated and comprehensive as international databases in terms of quality and quantity of information.

4) What is the current or planned regulatory approach on AI in general?

Data protection legislation has been enacted in the South African jurisdiction to control freedom of expression, access to information and rights to privacy. Statutory and institutional mechanisms for data protection of confidential, sensitive and private information including trade secrets are established.

Protection of personal information in the information society

Minimum threshold requirements were established for the processing of personal information by public and private bodies as perambulated by the Protection of Personal Information Act, No 4 of 2013 (POPI). This legislative text examines the right to privacy, including the right to protection against the unlawful collection, retention, dissemination and use of personal information. Administration by an information regulator bestowed or endowed with certain scope of powers and to perform certain duties and functions intended to regulate the flow of personal information within the South African territory was established in comport with the Promotion of Access to Information Act 2 of 2000 and Protection of Personal Information legislative framework.

Civil remedies may be sought by an affected data subject, or at the request of the data subject, the regulator may institute civil action for damages against the party for intentional or negligent breach whether as provided by section 99(3) of the POPI. Administrative fines not exceeding ZAR 10m may be imposed for alleged infringement if found guilty as encapsulated by section 109(2)(c) of POPI.

Protection of rights through accessing information held by state and private bodies

Digital access to information records stored on computers or in electronic or machine-readable form or such copy by an information requester may be granted or authorised by the public body concerned, as prescribed by section 29 of the Promotion of Access to Information Act 2 of 2000 (PAIA). A formal request for access to information must be made in the prescribed manner or form to the information officer of the public body concerned at his or her physical address or fax media or email address as stipulated by section 18(1) of the PAIA.

Voluntary disclosure and automatic availability of certain records are possible, subject to the head of a public body submitting a description of categories of records available to public access free of charge to the minister under legislative precepts as regulated by section 52 of PAIA. Additional functions of the Human Rights Commission include making recommendations for procedures in terms of which public and private bodies make information electronically available as governed by section 83 of the PAIA.

5) Which are the current or planned regulations on the general use of AI or machine learning systems?

Courts in the South African jurisdiction are undergoing digitisation and have adopted virtual court trials, including digital case management (caselines). Moving forward, the judiciary is prioritising digitising the functioning of courts to improve justice delivery and efficient performance. Court automation and the development of modernisation systems are of high priority for the justice department.

Recently, Mogoeng Mogoeng, the Chief Justice, announced that the digitisation project is piloting caselines in Gauteng,²³⁷ equipped with a functioning National Efficiency Enhancement Committee (NEEC) and its equivalents the nine Provincial Efficiency Enhancement Committees (PEECs), including the Regional and District Efficiency Enhancement Committees (REECs and DEECs), set up by the Office of the Chief Justice (OCJ), which is tasked with facilitating the development of an appropriate court-automation system to detect causes and solutions of delays in the justice system.²³⁸

Implementation of electronic filing and record-keeping, performance-related data capturing, information dissemination or access to information relating to cases, judgments and all other court operations brings it much closer to achieving the goals of modernising the court systems.²³⁹

237 South African Judiciary Annual Report (2017/18) p 9; South African Judiciary Annual Report (2018/19) p 7.

238 Judicial Newsletter Q3 Issue (December 2019) p 10.

239 (The South African Judiciary Annual Reports 2017/18:9; 2018/19: 7).

Court online components

The OCJ is in the process of developing and implementing Court Online. Court Online is an end-to-end e-filing, digital case management and evidence management system for the High Courts of South Africa. It provides legal practitioners with the opportunity to file documentation electronically online anywhere and at anytime without being physically present at court. It also affords law practitioners the ease of managing their court appearance diaries and court evidence instantaneously online.

Components of Court Online include: the front-end portal, workflow application, case management application, hearing application, evidence management application, post hearing or adjudication application and short message service (SMS) and email gateway to pass key information between the court and the litigants.

The front-end portal consists of a nine-step process to access the court online system:

- Step one: a law firm or litigant needs to create a once-off online profile so that they can access the court online system;
- Step two: a law firm or litigant must enter their identity document (ID) as part the online profile creation, which will be verified by the home affairs system along with all other information that citizenship can be verified;
- Step three: a law firm or litigant must enter their practice number as part of the online profile creation, which will be verified along the Legal Practice Council database of registered legal practitioners;
- Step four: upon registration, the law firm or litigant will register their digital signature on the system;
- Step five: the front end will provide law firms or litigants with an online case file through which they can file and view documents that have been filed by them, served on them or any messages received from the courts;
- Step six: upcoming hearing dates are also pushed through the front end at the law firm level and at the case level;
- Step seven: documents shall be sent as PDFs;
- Step eight: to file or serve a document, the law firm or litigant has to fill up the appropriate online template in the FE and attach the document to be filed or served in PDF format;
- Step nine, the entire submission may consist of one or several documents and this shall be digitally signed.

Physical court appearances became a thing of the past during the national lockdown caused by the Covid-19 pandemic. Court directives issued on 11 May 2020 provided physical court attendance was a last resort in the quest to strike a balance between access to Justice having regard to the lack of IT infrastructure and equipment in the regional courts of Kwa Zulu Natal.

6) Is free data access an issue in relation with AI?

General public importance issues arise from future challenges with the process of judicial transformation when implementing digitisation, virtual courts, electronic presentation of visual-audio 'e-evidence' systems, e-services, e-filing, adoption of email correspondence and new legal reform to supplement court rules.²⁴⁰ Forward thinking is required rather than a one-size-fits-all approach where great legal minds are admonished to apply the zebra approach to cater for unforeseen variables.

It is incumbent upon courts to be mindful of placing an iron curtain on the constitutional right of access to court justice and attenuating the right of access of information; it is especially important not to exclude the lay and illiterate from marginalised communities of previous disadvantaged people and disabled people. In the modern world, only the well-resourced tech savvy elite class will access speedy court processes. The circle of inequality hangs like a sledgehammer on legal migrants, refugees, undocumented citizens and second-class citizens, who may struggle to upload case files online since it requires citizens with a 13-digit green barcode identity approved by Home Affairs to access the automated court systems. Put simply, illegal immigrants and undocumented South Africans lack *locus standi* to be part of fair trials.

Diversity and inclusivity are the missing software components of technology since these require a certain level of literacy, training and exposure of the public to cloud computing and virtual platforms. Costs of technology remain a major impediment to free public access to data. Even recent interventions from the Independent Communications Authority of South Africa's (ICASA) latest regulations to lower costs of rollover data, airtime rates and usage notifications on mobile telecom service providers are a far cry from pragmatic solutions.²⁴¹

240 Reg 2 of the Government Gazette No 35450 published on 22 June 2012 by the Rules Board for Courts of Law inserted Rule 4A into the Uniform Rules of Court.

241 End-user and Subscriber Service Charter Regulations 2016 as Published under Government No 39898 of 1 April 2016, as amended in Notice No 233 of 2018 (Government Gazette No 41613).

7) Are there already actual court decisions on the provision of legal services using AI or decisions concerning other sectors that might be applicable to the use of AI in the provision of legal services?

Beware of the sheriff on social media you have been served!

Substituted service by way of publication in the Government Gazette, national newspaper and local newspaper of last known whereabouts of the party, by registered post, by service on a relative, by service on last known address or a combination of these methods may be effected with leave of the court as contemplated by Rule 4A of the Uniform Rules of High Court.

The High Court in *CMC Woodworking (Pty) Ltd v Pieter Odendaal Kitchens* 2012 (5) SA 604 (KZD) at para 13, per Steyn J, granted the applicant *in this case* leave for a notice to discover to be served by way of substituted e-service on Facebook in terms of Rule 4A with necessary conditions as directed by the court requiring publication of notice in the local newspaper. Influence from a comparable foreign civil procedure in Canada emanated from the decision in *Boivin v Associés c.Scott* 2011 QCCQ 10324 (Can LII), in which the court authorised service of motion proceedings via the defendant's Facebook account.²⁴²

Where spoliation remedy does not apply

In the case of *Telkom SA Ltd v Xsinet (Pty) Ltd* 2003 (5) SA 309 (SCA) it was impugned whether the court a quo made an error of law in ruling that the respondent had successfully proved quasi-possession and was legally entitled to the spoliation remedy for interference and undisturbed internet use from the appellant.²⁴³ On appeal, it was found that continuous use of internet connection does not per se, that is in its own right, constitute quasi-possession. Therefore, the spoliation remedy is not available to the respondent because the mandament does not protect infringement of incorporeal property.²⁴⁴

Freedom of expression on social media platforms

When considering the defamatory effects of publication on Facebook the Constitutional Court highlighted the need to consider the context of publication to strike a balance between the freedom of expression and right to dignity in *S v Mamabolo (eTV and Others Intervening)* 2001 (3) SA 409 (CC) at p429I-431B;

242 LTC Harms, *Civil Procedure in Superior Courts Issue 45* (2012: Durban: Lexis Nexis) B4–30.

243 *Telkom SA Ltd v Xsinet (Pty) Ltd* 2003 (5) SA 309 (SCA) paras 11–12.

244 *Ibid*, para 14.

Le Roux v Dey Freedom of Expression Institute and Another as amici curiae) 2011 (3) SA 274 (CC) at paragraphs 39 to 51.

In its decision the High Court in *H v W* at paragraph 40 held that the court only has the power to grant a restraining order to compel the respondent to remove already published information circulating on social media and not to prevent future publications. Reluctance of courts to interdict publication of information on social media has a chilling effect on the right to freedom of expression according to *National Media Limited v Bogoshi* 1998 (4) SA 1196 (SCA) at p1210G-I. Courts have a different attitude not to interfere with the free flow of information on news media because it infringes the right to freedom of expression.²⁴⁵

Protection of privacy in social media conflicts

The impact of social media conflicts arising from *iniuria* or injury to self-dignity and pride brings about the need to develop the common law protection afforded to the right to privacy. It is imperative to note the dangers of social media on this right. Therefore, there is a dire need to stress the introduction of legal reforms through legislation and necessary judicial interventions to turn Facebook to good use.²⁴⁶ The High Court in *H v W* 2013 (2) SA 530 (GSJ); [2013] 2 All SA 218 (GSJ) at paragraph 30, ruled that granting an interdict is the appropriate legal remedy to prohibit future infractions of one's right to privacy as set out in *Setlogelo v Setlogelo* 1914 AD 221 at 227.

Intercepting private communications is unconstitutional

Secret state surveillance, and interception, of communications between Sam Sole, a journalist and managing partner of the Amabhungane Centre for Investigative Journalism, a non-profit organisation, and Advocate Downer, a state prosecutor, were, without reasonable justification, facts leading to the judgment in this case. In *Amabhungane Centre for Investigative Journalism NPC and Another v Minister of Justice and Correctional Services and Others* [2019] 4 All SA 33 (GP); 2020 (1) SA 90 (GP); 2020 (1) SCAR 139 (GP) at paragraph 168, per Roland Sutherland J, the High Court granted a declaratory order of invalidity against bulk surveillance activities and foreign signals interceptions as unlawful, striking down the statutory provisions of sections 16(7), 17(6), 18(3)(a), 19(6), 20(6), 21(6) and 22(7) of the Regulation of Interception of Communication-Related Information Act 70 of 2002 (RICA) to be inconsistent with the Constitution and accordingly invalid to the extent that it failed to prescribe procedure for notifying the subject of the interception, including where the subject is a practising lawyer or journalist. Sections 35 and 37 of RICA were also declared inconsistent with the Constitution and accordingly invalid to the extent that the statute, itself, fails

245 LJ Strahilivetz, 'A Social-Network Theory of Privacy' V CHI L REV 72, 923-24.

246 J Grimmelmann, 'Saving Facebook' (94) *Iowa Law Review* 94 (2009) 1137-1205.

to prescribe proper procedures to be followed when state officials are examining, copying, sharing, sorting through, using, destroying and/or storing the data obtained from interceptions.

8) What is the current status – planned, discussed or implements – of the sectorial legislation in your jurisdiction on the use of AI in the legal profession or services that are traditionally being rendered by lawyers?

Judicial regulatory instruments

Transmission of any summons, writ, warrant, rule, order, document or other process in civil proceedings before a superior court or any communication by law, rule or agreement of parties may be effected or transmitted by fax or by means of any other electronic medium as provided by the rules in section 44(1)(a) of the Superior Courts Act 10 of 2013 read in conjunction with Judicial Regulatory Instruments (2nd ed) at 213. Notices sent by fax or any other electronic medium sent by any judicial or police officer, registrar, assistant registrar, sheriff, deputy sheriff or clerk of court is sufficient authority for execution of such writ or warrant for the arrest and detention of any person as envisaged by section 44(2)(a) of the Superior Courts Act 10.

Admissibility of digital evidence and the best evidence rule

Admissibility requirements of printed-out documents are governed by the provisions of section 15(1) of the Electronic Communications Act.²⁴⁷ When print-outs of email correspondences transmitted or sent as data messages in electronic form are presented in court, the best evidence rule applies with respect to such documentary evidence in terms of section 15(1)(b) of the Electronic Communications and Transactions Act 25 of 2002. Electronic signature is not without legal force and effect merely on the grounds that it is in electronic form as envisaged by section 13(2) of the Electronic Communications and Transactions Act 25 of 2002. Advanced electronic signature is regarded as valid electronic signature, unless the contrary is proved as ensconced by section 13(4) of the Electronic Communications and Transactions Act 25 of 2002.

The best evidence rule implies the originality, authenticity, veracity and reliability of the document is in compliance with the statutory requirements of sections 14 and 15 of the Electronic Communications Act.²⁴⁸ In determining the evidentiary weight of the data message, the reliability of such evidence is accorded to the manner in which it was generated, stored and communicated, integrity of data

²⁴⁷ S 15(1) of the Electronic Communications and Transactions Act 25 of 2002.

²⁴⁸ S 14 and 15 of the Electronic Communications Act 25 of 2002.

was maintained and the identification of the originator as encapsulated in section 15(3) of the Electronic Communications Act. There is a legal duty on the plaintiff to certify the data message as correct according to section 15(4) of the Electronic Communications Act.²⁴⁹

Cybercrimes and malicious communications offences regulations

On 1 June 2021, President Cyril Ramaphosa signed the Cybercrimes Bill of 2017 into law to regulate the jurisdiction of cybercrimes in alignment with foreign policy to allow inter-state cybersecurity mechanisms. The Cybercrimes Act 19 of 2020 introduces alternative sentencing regimes for cybercrimes and malicious communications in the context of criminal penology. What to expect from the new cyber laws includes the criminalisation of the unlawful securing of access, acquiring of data, unlawful acts in respect of software and hardware devices, malicious communications, cyber fraud, cyber extortion, cyber forgery and attempted means of same conspiring, inducing and abetting.²⁵⁰ The creation of new statutory criminal offences have a bearing on cyber-related acts and cybersecurity in attempts to regulate the digital playground.

Criminal proceedings on CCTV

Generally, court proceedings must be conducted in an open court with public access; subject to certain legal exceptions, justice may place a curtain on legal proceedings. Criminal proceedings can be held in camera, that is behind closed doors in accordance with prescribed requirements of section 153(1) of the Criminal Procedure Act 51 of 1977 (CPA). Based on the court's opinion to prevent revealing the identity of persons, if there is reasonable likelihood of intimidation or harm befalling witnesses, victim and witness protection in sex crimes-related trials especially minor children or vulnerable groups or class of persons, the trial may proceed in camera in terms of section 153(2) and (3) of the CPA.

Censorship of *sub judice* criminal court proceedings may be interdicted against any publications when it is just and equitable to do so in the eyes of the law as provided by section 154 of the CPA. All criminal proceedings must take place in presence of the accused except where judicial discretion fits or on application of the public prosecutor, the accused or witnesses' consent, evidence may be given by means of closed-circuit television or similar electronic media as envisaged by section 158(2) of the CPA. Courts may take into consideration certain factors such as prevention of unreasonable delays, saving costs, convenience, national interests

249 '(4) A data message made by a person in the ordinary course of business, or a copy or printout of or an extract from such data message certified to be correct by an officer in the service of such person, is on its mere production in any civil, criminal, administrative or disciplinary proceedings under any law, the rules of a self regulatory organisation or any other law or the common law, admissible in evidence against any person and rebuttable proof of the facts contained in such record, copy, printout or extract.'

250 S 2, 3, 8, 9, 10, 12 of Ch 2 and Ch 3 of the Cybercrimes Act 19 of 2020.

of state security, public safety and good order or interests of administration of justice or public interest, prevention of reasonable likelihood of harm or prejudice of persons as set out in terms of section 158(3) of the CPA.

9) What is the role of the national bar organisations or other official professional institutions?

South Africa's legal profession is undergoing judicial transformation spearheaded by the new Legal Practice Act 28 of 2014, which repealed the Attorneys Act and Advocates Act. This provides a legislative framework for the transformation and restructuring of a fragmented legal profession in line with constitutional imperatives. A priority is to facilitate and enhance an independent legal profession that broadly reflects the diversity and demographics of the Republic. The establishment of provincial councils and a single South African Legal Practice Council as the mother body regulating the legal profession came about as a result of these new developments. The appointment of a legal services ombud that functions to monitor and ensure fair, efficient and effective investigations by the investigations committee, conduct of disciplinary committees and the conduct of the appeal tribunals is prescribed by section 42 of the Legal Practice Act 28 of 2014.

National Bar Council of South Africa

The National Bar Council of South Africa (NBCSA) is a voluntary association formed to promote healthy competition between lawyers including advocates and attorneys, which will translate into a better and more cost-effective service to the public. Maintaining the true spirit of professional autonomy is the primary objective of the NBCSA. The core founding principles of the NBCSA include providing assistance of the previously disadvantaged to enter into the profession without having undue barriers of entry placed in their way. Campaigning for an accessible legal system through the provision of support to advocates and upholding the belief in freedom to practice.

Law Society of South Africa

The Law Society of South Africa (LSSA) brings together the Black Lawyers Association (BLA), the National Association of Democratic lawyers (NADL) and provincial attorneys' associations in representing the attorney's profession in South Africa. The LSSA undertakes advocacy initiatives in the interests of the legal profession and the public as part of its mandate. It aims to empower attorneys to provide excellent legal services to the community in an ethical, professional, considerate and competent manner. Its mission is to represent the attorneys' profession and to safeguard the rule of law via the efficient and fair administration of justice.

Legal Practice Council

The Legal Practice Council (LPC) is a national statutory body established in terms of section 4 of the Legal Practice Act. Facilitating the realisation of a transformed and restructured legal profession that is accountable, efficient and independent is a chief goal of the LPC, in accordance with section 5 of the Legal Practice Act. Imperative objectives of enhancing and maintaining integrity of the legal profession are necessary to preserve and uphold the independence of the legal profession. Regulation of all legal practitioners and all candidate legal practitioners is required to promote and protect public interests as the main function of the LPC and its provincial councils. The LPC's commitment to inclusivity and diversity ensures promotion of access to the legal profession, in pursuit of a profession that broadly reflects the demographics of South Africa. The LPC promotes high standards of legal education, training and compulsory post-qualification professional development. This seeks to ensure accessible and sustainable training of law graduates aspiring to be admitted and enrolled as legal practitioners. Registration and legal status of practising and non-practising legal practitioners including pending disciplinary processes, suspended practitioners and those struck off the roll is also now available to enable general members of the public to know their lawyer.

South African Judicial Education Institute

Training programmes ear-marked for judicial officers on a win-win court annexed mediation system facilitated by the South African Judicial Education Institute (SAJEI) was launched in July 2018. Judicial case flow management shall be directed at enhancing service delivery and access to quality justice through the speedy finalisation of all matters.²⁵¹ The National Efficiency Enhancement Committee, chaired by the Chief Justice, shall coordinate case flow management at national level. The head of each court shall ensure that judicial officers conduct pre-trial conferences as early and as regularly as may be required to achieve the expeditious finalisation of cases.

The finalisation of all civil cases in the High Court must be within a year of the date of issue of summons. In the magistrates' courts it must be within nine months of the date of issue of summons.²⁵² Judicial officers are required to finalise criminal matters within six months after every accused person pleads to the charge within three months from the date of first appearance in the magistrates' court.²⁵³

In conclusion, future litigation in virtual courts has become a virtual reality of modern litigation. Ongoing judicial transformation requires that legal reforms must accommodate the ever-expanding technological advancements. AI forms

251 Judicial Regulatory Instruments (2nd ed) 178 para 5.2.4.

252 *Ibid.*

253 *Ibid.*, 179 para 5.2.5.

part of the solution as court structures are entering the digital space to suit the e-justice system. Online dispute resolution is the gateway for speedy alternative dispute resolution mechanisms that provide a smart remote solution through video conferencing, e-courtrooms and virtual courtrooms of today.²⁵⁴ It seems the law has apparently left the proverbial walking stick for the electric wheelchair.

254 I Knoetze, 'Courtroom of the future – virtual courts, e-courtrooms, videoconferencing and online dispute resolution' *De Rebus*, 2014 (546) 28–29; Will K Kaplan, 'Will Virtual Courts Create Courthouse Relics?' *The Judges' Journal* (2013) Vol 52(2) 32.