Understanding IT for Dispute Resolution

By Dory Reiling Mag. Iur., Dr. Iur., Judge, 1st Instance Court of Amsterdam

Judges and judiciaries do not understand information technology (IT). This idea crops up quite often in discussions about IT for courts. The perceived slow rate of IT adoption in courts is explained by this lack of understanding. To my mind, this is not the main issue. What needs to be understood first is at the other end of the spectrum: how courts process information.

Therefore, I have studied the way courts process information and what this means for IT. I have studied IT for courts since the early 1990s. This article presents some of the findings from my 2009 book Technology for Justice (Reiling 2009)[1]. It uses a conceptual framework developed to (1) help IT specialists understand more about court processes, and to (2) help judges and court staff grasp what IT can do in their case processing. It has become a nifty tool showing how IT functionalities can help to implement improved case processing. It also shows innovative ways of handling information, towards more timely and adequate judicial decisions and increased access to justice.

This article does not provide a systematic overview of technology in use by courts[2], or a general theory of processing information across the board. However, it does present a fresh look at how *knowledge about what goes on in a court can help us to understand what can be improved*. Traditional approaches to improving court performance and reducing case delay have turned out to be of limited usefulness. Besides, most court systems have not changed their traditional processes under the influence of information technology. The model I use helps judiciaries, court managers and other with insights on case management, standardizing processes, information service to court users and the general public, and IT policy making. The examples I use are all from civil justice. I make no claims as to their applicability to administrative or criminal justice, but I do think the reader can find some more general lessons in my story.

This article shows four ways to use the model. There is, of course, much more in my book. Before looking at the model itself, we need to set out some concepts related to what courts do.

1 Court roles, processes, products and outputs

The role of courts in general is to produce enforceable decisions, in other words: to provide title. The enforceable decision, therefore, is their product. The first question we explore is, how the enforceable decisions produced by the court are of value to the court users.

The framework used here explores how what courts do is useful for their users. It was first introduced by Blankenburg in a comparative study of German and Dutch courts in the light of access to justice and alternatives to courts (Blankenburg 1995). I have adapted it somewhat, but the roles allocated to the court remain the same (Blankenburg p. 188). Four specific roles fulfilled by courts can be identified: (1) title provision, (2) notarial role, (3) settlement, and (4) judgment. Each of these roles brings with it a specific product and output. The products affect the way information is used in the primary judicial process. That makes them relevant for our discussion.
Two factors affect court processes in a major way:

- the *uncertainty of the outcome*
- the *relationship* between the parties.

The outcome is the *content* of the decision: the divorce arrangement is in keeping with regulations, the claim is unfounded.

---

[1] Dory Reiling, Technology for Justice, How Information Technology can support Judicial Reform Leiden University Press and Amsterdam University Press, Law, Governance and Development Dissertation Series, 2009. My book is also available as a free e-book on my web site:http://home.hccnet.nl/a.d.reiling/html/dissertation.htm.

[2] That overview is in Part 2 of my book.

ISSN 2156-7964

The outcome of a process can be completely certain and certain from the outset, or it can be more or less uncertain at the outset. In that case, events happening along the way can affect the outcome. In terms of information: the information available at the outset of the process can be either sufficient or insufficient to produce the outcome.
In terms of game theory, the outcome is either zero-sum or win-win. Zero-sum describes a situation in which a participant's gain or loss is exactly balanced by the losses or gains of the other participant. The relationship between the parties is irrelevant to the outcome. In win-win, parties can achieve the best result by cooperating. In this case, cooperation can affect the quality of the outcome. Figure 1 shows how these factors relate to each other.

Figure 1 Matrix of Judicial Roles

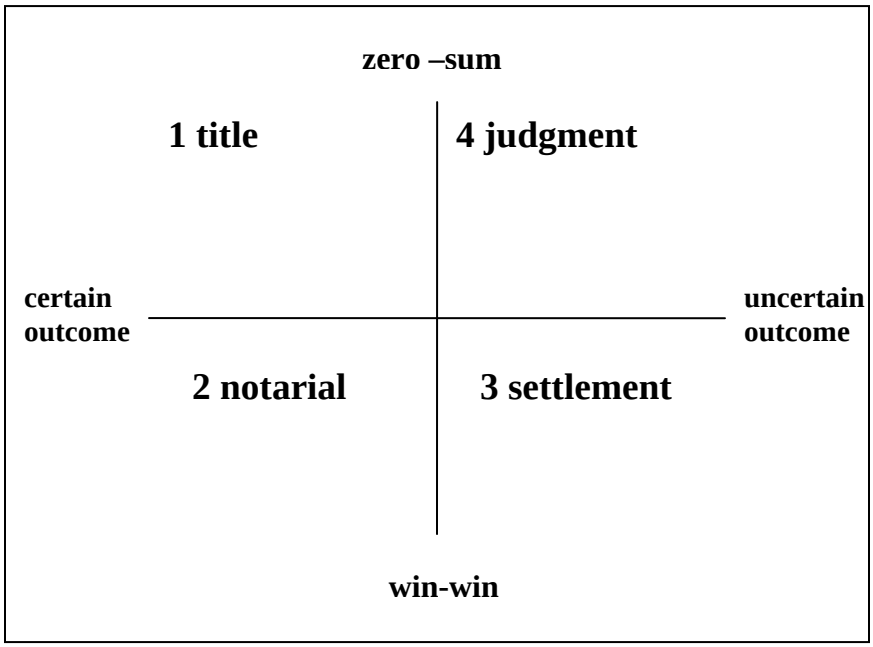


Figure 1 shows roles and factors in a matrix. In this matrix, the role of the court and the ensuing products are arranged along two axes: the relative uncertainty of the outcome from left to right, and the parties' relationship in terms of zero sum and win-win from top to bottom. Individual cases are on a continuum, both vertically and horizontally. A case or a decision can be mostly notarial with a little judgment, or mostly judgment with a little settlement.
The next step explores how court cases fit into the groups in our model.

Introducing the groups and their characteristics
Providing title is the role in the first group. The product of the judicial process is always a title. However, it is the output of this group in particular. Here, we deal with a process that does no more than producing that title. The case is "cut and dried" (Galanter 1983b). The outcome is zero-sum because one party gains and the other party loses. The process in this group is characterized by a very low level of uncertainty. Undefended money claims come to mind as an example.

The *notarial role*, group 2, produces an affirmation, a formal declaration that the arrangement proposed by the parties is legal. It also entails little uncertainty. The outcome is win-win. By cooperating, the parties can achieve an optimum result. This process is also characterized by low uncertainty. Ideally, parties propose an arrangement they have worked out among themselves. The arrangement is examined by the court only marginally. Family cases and plea bargaining are some of the examples for this group.

The *settlement role*, group 3: here, the overriding objective is for the parties to reach agreement. This agreement is the output. The outcome is win-win. The process is characterized by uncertainty about the outcome, and by communication

ISSN 2156-7964

and negotiation. Very complex information, needed to help the parties to reach agreement, can be the object in this process.

The *judgment role*, group 4, is widely regarded as the judiciary's main function. The outcome of the process is dependent on all sorts of events that may occur during the process. The parties are in opposition. The court decides. This process may involve large amounts of complex information. It should be noted here that the difference between groups 1 and 4 is relative, in the sense that the outcome is more or less uncertain. If no or almost no legal issues need to be decided, the case is regarded as a title group case. As the number of legal issues to be decided increases, the case moves in the direction of the judgment group.

In the next section, I have taken the actual caseload of civil justice in the Netherlands and sorted the cases into the groups according to the model developed above. We can determine the relative share of each group in the total caseload. The resulting picture is primarily important to determine where efforts at implementing IT can be most effective.

2 Cases into groups

The next step in our exploration is to apply the matrix to civil justice in the Netherlands. The purpose of this section is to learn how different processes use information in order to understand what they need by way of specific IT functionality.

A case study of civil justice in the Netherlands

The Dutch court system has some of the characteristics of the classic Napoleonic civil justice (as opposed to common law) system. It has three tiers of jurisdiction. The Netherlands has a legal culture in which settlement plays a substantial role[3]. Civil procedural law instructs judges to attempt settlement before deciding a case on its merits. It will be interesting to see whether other legal cultures have demonstrably different patterns, and whether those patterns show up in the matrix. However, in 2007, all instances together disposed more than 900,000 civil and family cases. Statistically, appeal and Supreme Court figures do not influence the distribution in the groups we will be looking at below[4]. That is why, from here on, only the statistics for the first instance of civil justice in the Netherlands are taken as our object of study. The first step is to find out which case types are in each group, relative to the total caseload.[5]

The counts were done, based on disposed case statistics, as follows:

---

3 Settlement appears to be a very old Dutch custom. Here is a quote from Voltaire in which he praises enlightened court practice in Holland in the 18th century:

***« La meilleure loi »* selon Voltaire**

Voltaire évoquait dans une lettre en 1745, une pratique judiciaire des Pays-Bas, de magistrats dits « faiseurs de paix » : *« La meilleure loi, le plus excellent usage, le plus utile que j'ai vu, c'est en Hollande. Quand deux hommes veulent plaider l'un contre l'autre, ils sont obligés d'aller d'abord au tribunal des juges conciliateurs, appelés faiseurs de paix. Si les parties arrivent avec un avocat ou un procureur, on fait d'abord retirer ces derniers, comme on ôte le bois d'un feu qu'on veut éteindre. Les faiseurs de paix disent aux parties : vous êtes de grands fous de vouloir manger votre argent à vous rendre mutuellement malheureux. Nous allons vous accommoder sans qu'il vous coûte rien. Si la rage des chicanes est trop forte dans ces plaideurs, on les remet à un autre jour, afin que le temps adoucisse les symptômes de leur maladie. Ensuite les juges les renvoient chercher une seconde, une troisième fois. Si leur folie est incurable, on leur permet de plaider, comme on abandonne à l'amputation des chirurgiens des membres gangrenés ; alors la justice fait sa main*.

***«The best law»* according to Voltaire**

Voltaire, in a letter in 1745, recalled a judicial practice in the Netherlands, of magistrates called « peace makers »*: The best law, the most excellent custom, the most useful I have seen, is in Holland. When two men want to plead one against the other, they are obliged to first go to the tribunal of the judge conciliators, called peace makers. If the parties come with a lawyer or an attorney, the latter are made to leave, like one draws the wood from a fire one wants to extinguish. The peace makers say to the parties: you are great fools to want to eat your money by making each other mutually unhappy. We are going to help you and it will not cost you anything. If the rage of chicanery is too strong in the pleaders, they are deferred to another day so time can soften the symptoms of their illness. Then the judges refer them a second and a third time. If their folly is incurable, they are allowed to plead, just as limbs with gangrene are left for amputation by surgeons; thus, justice takes its course.*

4 For statistic tables for the years 2002-2007, see D.Reiling, Technology for Justice, p.119.

5 In many countries, courts also keep various registers, like the commercial register or the land register. It is safe to assume that the register role is an area in which use of information technology can be of great help to improve performance. However, case processing, not the register function, is our subject here, so this category of court work is not discussed here.

ISSN 2156-7964

Group 1: Final dispositions and summary dispositions of undefended money claims, both for the local court and the district court.
Group 2: Dispositions in parental authority, supervision and settled employment termination cases in the local courts, and dispositions in divorce related family cases in the district courts.
Group 3: Cases withdrawn at the parties' request or struck off the record.
Group 4: Final dispositions of contested civil claims, including those going through a phase of fact-finding by hearing witnesses and viewing locations, for both local and civil courts[6].

Figure 2 Matrix of Judicial Roles and Caseloads

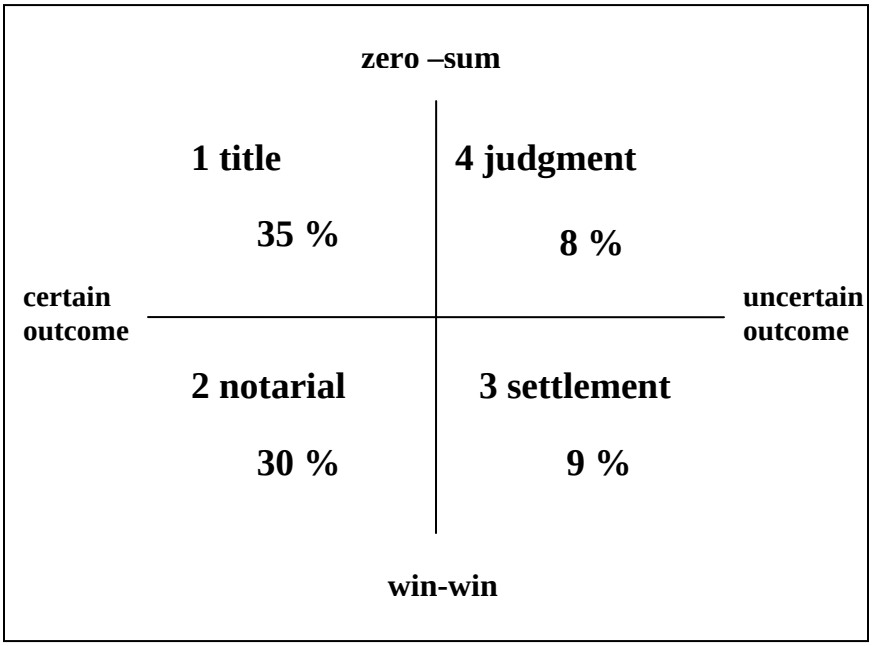


Figure 2 shows the matrix with the distribution of cases over groups, as a percentage of total civil case dispositions in 2007.[7] The numbers vary slightly over the years, but the variation in distribution is not significant.

Group 1 is the largest with 35 percent of the total case production. Group 2 is only somewhat smaller at 30 percent. Groups 3 and 4 are much smaller. Group 3 is 9 percent of the total caseload and group 4 is the smallest, at 8 percent. Group 4, in which defended cases are decided by the court, is normally considered judicial work *par excellence*. Yet, it is only 8 percent of the case production.

Relatively few cases, less than 20 percent, need more information during the court procedure in order to bring a resolution of the dispute closer. Half of those cases are most probably resolved with a settlement (role 3). What is left after that is a small fraction of the total caseload in which disputes are decided by a judicial decision (role 4).

The title group is the largest group, and its outcome is zero-sum and certain. That makes this a good candidate to start automation, that is, developing routines for electronic processing. The notarial group comes in a close second because of its certain outcome.

6 The full table is in the book on page 120.

7 The remaining 23 percent cannot be categorized meaningfully for the purpose of this study. It includes supervision of bankruptcies, juvenile justice, other case groups that are very small but very diverse, and various supervision activities. Most of them are not dispute resolution in any sense of the word.

ISSN 2156-7964

Starting from this information about Dutch court practice in each group, the next section examines each of them to understand the implications of its characteristics. How do their characteristics affect handling the information involved? What are the consequences for supporting and improving the process with IT? Examples of proven technology and of changes in business processes that enable new technological solutions are analyzed. Each discussion of a group wraps up with conclusions for information technology support for that group.

Group 1 – Title role

The outcome of the cases in this group is both zero-sum as well as highly certain. Because the outcome is certain and zero-sum, generally speaking the information that is available at the outset is sufficient to decide the case. It seems reasonable to assume that this process should be the easiest one to automate. Automation means: creating a process that can be handled by a machine without human intervention, translating policies and routines into programs for electronic processing. The other opportunity is in the interaction with the parties submitting cases. If the parties file their cases by submitting structured data electronically, and the internal court process receives those data, manual data entry by court staff is avoided. If court routines are translated into programs to handle those data, the titles that are the product of this process can be produced (almost) without human intervention.

Example 1: Online claims in the United Kingdom

The first example that is relevant for group 1 cases comes from the United Kingdom (Timms 2002 and 2003[8]). It consists of three online systems: the Claims Production Centre (CPC), Money Claim On Line (MCOL) and Possession Claim On Line (PCOL). These systems are the best known examples of online title provision. makes claiming far simpler and faster: fees are paid electronically, claims issued straight away and hearing dates scheduled automatically. Entering a defense online has been possible via the MCOL system for all claims issued via either MCOL or the CPC since December 2002. If claims are defended, they are automatically transferred to the court that is competent according to the normal rules.

There are some particular features in civil procedural law in England and Wales that enable, or at least facilitate, the use of online claim processing: No summons, no obligatory court competence, and no lump sum court fees.

Example 2: The *Mahnverfahren* in Germany

The *Mahnverfahren* in Germany is a procedure to acquire an order of payment online. This procedure was introduced successively from state to state, and is now available in all the *länder* or states of the German federation. This procedure produces a title, but without a judicial procedure. Apart from the classical application in writing, there are various ways available for filing an application for a Mahnbescheid, the title for execution of payment. In 2003, more than 90 percent of nearly 9.5 million orders for payment in Germany were processed automatically (Šijanski and Barber p. 1).

Example 3: A pilot in the Netherlands

In the Amsterdam local court, the largest local court in the country, a pilot was done with data transmission in a specialized case stream. The pilot was an initiative of an Amsterdam bailiffs' office. This considerably shortened both disposition time (the time a case is in the court register) and processing time (the time someone actually performs an activity related to the case) for undefended cases. The functionality tested in this pilot was never implemented widely. The bailiffs in the Netherlands say they can supply processing information to the courts electronically, provided an interface for supplying the data is set up (Struiksma p. 202).

IT for the title group

In these zero-sum, low unpredictability cases, there is no dispute. Consequently, there is also not much judicial dispute resolution activity in this group. Judicial activity in individual cases is very limited. The case volume in this group can be quite a large part of the total caseload. For small claims courts, it is a group worthy of attention.

The information that is available at the outset is usually sufficient for producing the final product. The IT processing activity in this group is mostly merging data with text to produce decisions. That activity is supported by office automation, such as word processing and case registration databases.

---

8 Presentation by Perry Timms of the U.K. Court Service in 2002 at the Netherlands judiciary IT conference, and at the 2003 NCSC Court Technology Conference, CTC8. A copy of the Power Point presentation is in my possession. The information was updated with the contents of the Court Service web site http://www.hmcourts-service.gov.uk in March 2008.

ISSN 2156-7964

The information opportunities for such zero-sum, low unpredictability cases are in:

- Online case filing and/or data entry by court users, including data transfer from frequent users,
- Internal processes processing data without the need for human intervention.

If users fill the case database, time consuming data entry work is reduced.[9] Moreover, when standardized, parts of case processing can be automated. Consequently, cases will move to the left in the matrix.
The opportunities were developed in different ways. The Mahnverfahren was piloted in one *land* (state), and then implemented gradually in the other states. MCOL was developed in stages.

Group 2 - Notarial role
The outcome of the cases in this group is both highly certain and mostly win-win. The notarial group includes dispositions in parental authority, supervision and settled employment dissolution cases in the local courts and dispositions in family cases in the district courts. The win-win aspect points to a new opportunity: guidance for the parties to help them achieve the best result in working out the terms of the request to the court.

Example: Employment contract dissolution in the Netherlands
This example shows an effort to increase legal consistency by the labor judges. They simplified issues and procedures, including a formula for calculating severance pay.

The most important intended impact was to create a much-needed legal standard for the judges themselves. A expected, but not intended, impact was to have more negotiated and settled dissolutions, through this improved legal unity. The most striking finding is that a significant number of judgment group (group 4) cases moved to the notarial group (group 2) as a result of this reform[10]. In 1997, 24 percent of cases settled, in 2007 it was 82 percent.

Most organizations involved in providing legal information on labor issues to the public have the guideline on their web sites. The formula is quite straightforward and easy to use.

IT for the notarial group
In the notarial group, there are two main opportunities for applying IT. The first already emerged in the title group. The second opportunity is in web functionality to inform parties on bringing cases to court, and on the information the court needs to deal with the case expediently. The Internet is a vehicle for this information. Courts can help parties by specifying the information they need, and what criteria they use to judge incoming requests. Parties may also use this information to settle their differences.

A more advanced opportunity for this group combines both data entry and guidance in online forms for filing both data and substance.

Group 3 – Settlement role
In the settlement group, the outcome is relatively uncertain as well as largely win-win. There is a dispute, but if the parties cooperate to settle it, they may be able to produce an outcome that is beneficial for both, and their relationship may be saved. The dispute need not necessarily be resolved exactly according to the rules of the law.

This group comprises about 9 percent of the total civil caseload. It consists of very diverse cases that are either withdrawn or struck off the record before or after a hearing.

[9] Technically, users do not have direct access to the live case registration database. Data entry is done through an extranet where data are checked before they are allowed to populate the database itself.

[10] Full description of this example in Reiling 2009 pp 135-142.

ISSN 2156-7964

The Netherlands have a long tradition of settlement. The civil procedural code instructs judges to try settling a case before resolving it in the legal manner. In recent years, court practice has focused on less formal ways of dispute resolution. The gap between dispute resolution by courts and informal mechanisms like mediation is narrowing.

Internationally, various informal and formal ways of court-supported dispute settlement are in practice, for example conciliation, mediation, and neutral case evaluation. In *The Future or Law*, Richard Susskind suggests that publishing general rules of thumb as to how things can be arranged and resolved in general may prevent disputes from breaking out (Susskind 1998 p. xlviii). It can also guide solutions in case of settlement.

Example 1: Australia – Adelaide Magistrate's Court
An example of the use of prelodgement notices comes from Australia (Cannon 2002). The procedure described here was introduced in 1999. The Magistrate's Court (in this example that of Adelaide) provides forms available on its web site. The final notice and an Enforceable Payment Agreement (EAP) can be downloaded from the court's web site. The ability to have mediation and expert advice prior to a formal claim being lodged with the court means that an ADR process can occur earlier than the involvement of the court in a conference/ directions hearing phase.

Example 2: Singapore's e@dr negotiation
The Singapore subordinate courts offer the possibility of electronic alternative dispute resolution: an amicable, cost-free avenue to initiate negotiations with the other disputing party.

Example 3: Online dispute resolution mechanisms outside courts
In e-commerce, new online forms of dispute solution come up where parties can negotiate supported by a computer program. This facilitates participants' independent resolution of the problem with the other side. Since 2004, the City of New York has piloted using www.cybersettle.com for settling claims filed against it.

IT for the settlement group
The Singapore example shows support for negotiation, where parties themselves resolve their dispute. It uses email, asynchronous communication, between the parties. The court acts as a go-between. Asynchronous communication may give parties time to think. However, it does not particularly favor cooperative behavior.

The Adelaide example shows another way of preventing cases from coming to court. This example uses the court's web site and online forms. These examples show how, using the functionalities of email and a web site with information and online forms, a potential dispute is moved down, as well as to the left in the matrix. The result contains costs and avoids a complex, lengthy procedure. These opportunities do have a limit: communication over distance may not be enough, so face-to-face contact may still be necessary to broker an agreement.

Another potential opportunity, guidance for parties negotiating a settlement, already came up in the notarial group.

Group 4 – Judgment role
In the judgment group, the outcome is uncertain as well as zero-sum. There is a dispute. The parties are in opposition. Events during the process influence the outcome. The case is decided on legal merit. The court decides. In this group, both processes and substance can be complex. Cases in this group, although relatively few in relation to the total case load, take up the most judicial time. Time to disposition is considerable.

IT for the judgment group
Judgment group cases are complex to very complex. There is an expressed need for structuring complex information. Electronic case files are a functionality that could be helpful in this group. They can be used to structure large quantities of information using electronic search capability. Electronic case files also support multimedia evidence. Some U.S. courts have introduced electronic case files for difficult, complex cases involving many parties or large amounts of information. Their experience shows results such as increased efficiency and accuracy of information.

ISSN 2156-7964

The other functionality for this group is knowledge management systems. Increasingly, courts already have experience with jurisprudence databases and decision support systems. They help judges take legally correct, consistent decisions.

Case processing as information management

Looking at case processing as a process of information management helps to see opportunities for information technology applications in order to improve case processing. We have uncovered some actions that will result in cases moving to the left and/or down in the matrix.

Simplification: Creating routines and standards will move cases to the left. This reduces unpredictability through reducing the number of individual decisions that have to be taken in each case. In the example of the labor cases, a majority of cases moved from the judgment group to the notarial group. Therefore, cases may even be moved out of court entirely when the parties are given enough information to resolve their dispute by settlement. Thus, problem solving by the parties is encouraged. If, like the Dutch peacemakers in Voltaire's letter in the footnote above, we think this is a useful and socially desirable objective, these are ways to move cases down in the matrix.

Early intervention: Early intervention in individual cases can have two effects: reduced complexity moves a case to the left; facilitating settlement moves the case down. The example of the online pre-action protocols illustrates how a complex, lengthy process is avoided. A potential dispute is moved down, as well as to the left in the matrix to such an extent that it never gets to court.

3 IT needs and opportunities

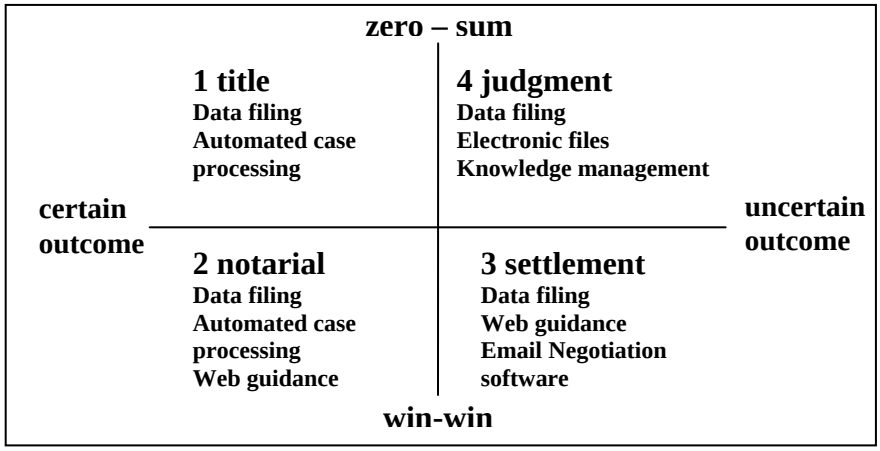
The matrix demonstrates how a court caseload can be grouped into four distinct categories. For each group, the matrix brings up specific IT opportunities and needs. For all groups, but particularly for the *title* group, electronic filing is an opportunity that will save processing time. Most claimants are firms, and most claims are filed by either law firms or bailiffs. Most of them mostly have an automated client administration. If they could supply those data to the courts, like in the bulk claim center in the United Kingdom, data entry in courts can be avoided.

In the *notarial* group, the main opportunity is web functionality. Information on the court web site, online forms and information for settlements can be ways of stimulating the parties to work together to resolve their own disputes.

In the *settlement* group, communication technology, either email or dedicated software, can help parties settle disputes with a less certain outcome.

In the *judgment* group, the foremost need is for managing complex information. The opportunity of electronic case files presents itself here. Electronic files open up new opportunities themselves with multimedia storage of evidence and hearing recordings.

Figure 3 – IT for the groups



ISSN 2156-7964

The matrix predicts that electronic filing of claims, online data entry and electronic case files will reduce processing time, and possibly disposition time, for all cases. Automating routines can speed up processing for the title group. Internet functionality for public information and electronic forms supports the notarial group. Likewise, public information and software supporting negotiations can support processing specifically for the settlement group. Electronic files and knowledge management are the main tools specifically for the judgment group.

4 Interaction with the parties

Electronic interaction between courts and their users emerges as an opportunity for improving the administration of justice. It may prevent disputes from coming to court and improve handling the cases that are filed. How can information technology support the role of the courts in what is broadly called providing access to justice?

From Hazel Genns Paths to Justice research and its Dutch counterpart the Dispute Resolution Delta, on how people resolve their justiciable problems (Genn 1999, Van Velthoven 2004), we know that they need information on (1) settling and staying out of court, and on (2) bringing cases to court.

Keeping cases out of court

For the relatively complex problems that come to court, potential court users usually seek and find information. The notarial and settlement group cases present a landscape of resolving justiciable problems in different phases of their development, aided by court jurisprudence and policies. The information people actually need is on:
(1) how to resolve problems
(2) rights and duties
(3) taking a case to court.

They also always need advice, and they may also need assistance with resolving their problem. Information about norms that are applied by the court can help the parties. This kind of information rings of what Richard Susskind called the golden legal nuggets: punchy, jargon-free practical points, rather than detailed legal analysis (Susskind p. xlviii). Their basis may be in tendencies in decisions by lower courts, as well as in established case law or jurisprudence. For justiciable problems for which the golden nuggets are not available, generating information on general trends is an option, possibly with technological support. Court decision support systems help judges and courts to reach decisions. If public, they can also guide out-of-court solutions.

Bringing cases to court

How can information technology help those who need to take their case to court? Correct, adequate information can give one-shotters, those who do not use the courts on a regular basis, a better chance of a just and fair outcome of their case by enhancing their procedural position. Moreover, a modern government organization - courts included - should inform the public clearly about its procedures. Thirdly, most one-shotters come to court after having first received advice and/or assistance (Genn, 1999, Van Velthoven 2004). Bailiffs, legal service providers, clerks and ushers all give information. The information service is fairly random. There is room for improvement.

This section examines what courts can do with information technology to meet the information needs that one-shotters when they need to come to court. In order to answer that question, it looks at:

- The cases for which one-shotters come to court
- Their related information needs
- How information technology can help to meet those needs.

The information needs are primarily individual information needs, related to the dispute's problems. However, there are also more general or collective information needs. They are not the topic of this article, but they are discussed in Part 4 of the book.

ISSN 2156-7964

In order to identify litigants' information needs, we take up Marc Galanter's matrix on party configurations in litigation between the one-shotters and repeat players, those who are engaged in many similar procedures over time (Galanter 1974 p. 14-15). Figure 4 translates Galanter's party configurations to the case matrix from the earlier sections.

Figure 4 Matrix of Party Configurations

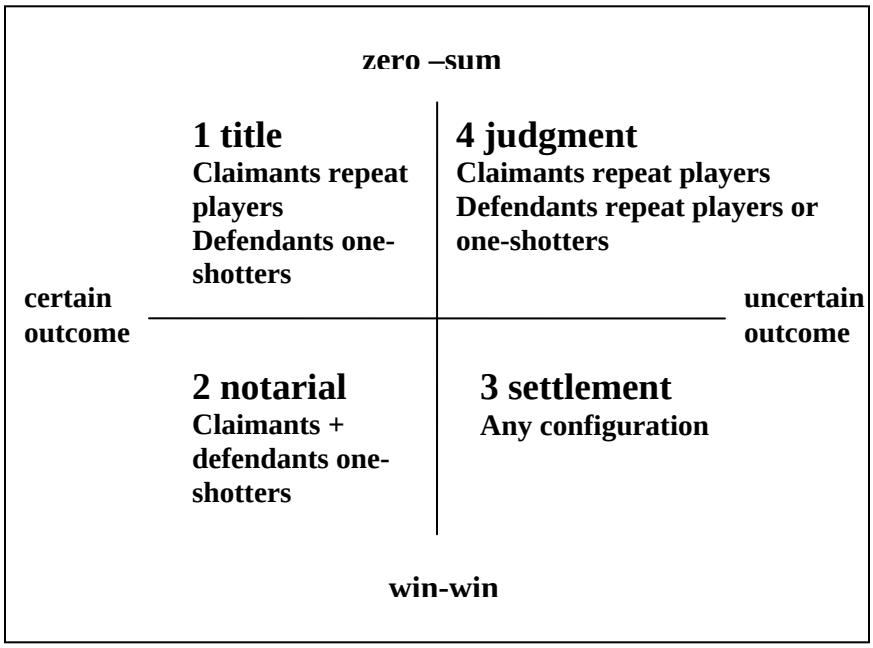


Figure 4 shows the most common party configurations in the case processing matrix. Title group claimants are mostly repeat players. Most one-shotters in this group will be potential respondents who choose not to contest the claim. One-shotters who may have a defense will be helped with information on how to defend themselves or on finding help with it.
The notarial group comprises what Galanter calls pseudo-litigation, family and labor matters between one-shotters. Courts are addressed ad hoc. Parties come to court because the law requires a judicial decision. Cases involving relationships can be difficult to resolve.

Settlement group matters can be any party configuration. Court help with settlement may well be most needed in unequal party configurations. This will prevent these matters from becoming group 4 cases.

The judgment group's party configurations are similar to those of the title group, but now with a defendant. Information needs in this group will be diverse.

Conclusion: Modeling civil justice and IT

Judicial decision making can be an extraordinarily complex process. Different models were developed to capture this complexity: Shapiro's triangle of dispute resolution, the continuum of dispute resolution modes, Zuckerman's triangle of time, cost and truth (Shapiro p. 2; Zuckerman p. 48). I have developed my matrix to capture how judicial roles, court case loads and party configurations relate to using information technology.

The matrix is a useful tool. It visualizes first and foremost, by looking for similarities, how court cases actually differ. Using court statistics where available, it presents a picture of the case load. For IT policy, it makes clear how case handling in the title group is a good candidate for automation. Notarial cases can also benefit from information service to court users. In the same vein, parties wanting to settle their dispute can benefit from information on court policies and on general trends in judicial decision making. Thus, it not only points the way for internal process support, but also for electronic interaction with the users. Electronic interaction also provides courts with an opportunity to support access to justice and fulfill their shadow function of the law (Galanter 1983a). The matrix can help set priorities for judiciaries wanting to improve their performance using information technology.

ISSN 2156-7964

Bibliography

Blankenburg, E.R. 1995. Access to Justice and Alternatives to Courts, Civil Justice Quarterly, volume 14, July, pages 176-189.

Cannon, Andrew. 2002. Electronic Prelodgement notices in the civil jurisdiction of the magistrates court, at http://www.aija.org.au/tech3/program/presentations/Prelodgm.doc[11]

Galanter, Marc. 1974. Why the Haves come out ahead: speculations on the limits of legal change. *Law and Society Review*, Vol. 9, nr. 1, p. 95-160. http://marcgalanter.net/Documents/papers/WhytheHavesComeOutAhead.pdf

1983a. The Radiating Effects of Courts, at http://marcgalanter.net/Documents/papers/scannedpdf/RadiatingEffectsofCourts.pdf (File size= 76M)

1983b. Reading the landscape of disputes, *UCLA Law Review*, October.

Genn, Hazel. 1999 *Paths to Justice. What people do and think about going to law.* Oxford and Portland, Oregon: Hart Publishing.

Reiling, Dory. 2009. *Technology for Justice, How Information Technology Can Support Judicial Reform*. Leiden University Press.

Shapiro, Martin. 1986. Courts. *A comparative and political analysis*. Chicago and London: University of Chicago Press.

Sijanski, Grozdana, and Jimmy Barber, The German order of payment procedure (Mahnverfahren), German Law Archive, at The German order for payment procedure (Mahnverfahren)

Susskind, Richard. 1998. *The Future of Law*. Oxford University Press.

Struiksma, D. and A.W. Jongbloed. 2006. "Bailiffs on the e-Highway". *Information & Communications Technology Law* 15: 201-206.

Timms, Perry. 2002. Presentations at the 2002 Netherlands Judiciary IT Conference and at the 2003 NCSC Court Technology Conference, CTC8.

Van Velthoven, B.J.C., and M. Ter Voert. 2004. *Geschilbeslechtingsdelta 2003.* Den Haag: Boom. At http://www.wodc.nl/onderzoeksdatabase/geschilbeslechtingsdelta.aspx?cp=44&cs=6796

Zuckerman, A. 1999. Civil Justice in Crisis. Comparative perspectives of civil procedure. London: Oxford University Press.

[11] All web sites were last visited on January 23, 2011.

ISSN 2156-7964