

IV. AUTOMATIC DATA PROCESSING

Legal implications of automatic data processing: report of the Secretary-General (A/CN.9/292)

1. The Commission at its seventeenth session in 1984 decided to place the subject of the legal implications of automatic data processing to the flow of international trade on its programme of work as a priority item.¹ In doing so, it took note of a report of the Working Party on Facilitation of International Trade Procedures, which is jointly sponsored by the Economic Commission for Europe and the United Nations Conference on Trade and Development, suggesting that, since the legal problems arising in this field were essentially those of international trade law, the Commission as the core legal body in the field of international trade law appeared to be the appropriate central forum to undertake and co-ordinate the necessary action.²

I. Meeting hosted by commission secretariat

2. At its nineteenth session in 1986, the Commission had before it a report of the Secretary-General describing the work of international organizations active in the field of automatic data processing (A/CN.9/279). The Commission approved the suggestion contained in the report that it might undertake leadership in the co-ordination of activities in this field by requesting the secretariat to organize a meeting in late 1986 or early 1987 to which all interested intergovernmental and international non-governmental organizations might be invited.³

3. The criterion used for inviting organizations to the meeting held at Vienna on 12-13 March 1987 was to invite all those mentioned in the report plus those known to be interested in the matter, i.e.:

Central Office for International Rail Transport
Council of Europe
Customs Co-operation Council
Economic Commission for Europe
European Communities, Commission of
Hague Conference on Private International Law
International Air Transport Association

¹Report of the United Nations Commission on International Trade Law on the work of its seventeenth session, *Official Records of the General Assembly, Thirty-ninth Session, Supplement No. 17 (A/39/17)*, para. 136.

²The report of the Working Party is reproduced in A/CN.9/238, annex.

³Report of the United Nations Commission on International Trade Law on the work of its nineteenth session, *Official Records of the General Assembly, Forty-first Session, Supplement No. 17 (A/41/17)*, para. 261.

International Bureau for Informatics
International Chamber of Commerce
International Civil Aviation Organization
International Law Association
International Maritime Organization
International Rail Transport Committee
Organization for Economic Co-operation and Development

4. The following organizations attended:

Central Office for International Rail Transport
Council of Europe
Economic Commission for Europe
European Communities, Commission of
Hague Conference on Private International Law
International Maritime Organization
Organization for Economic Co-operation and Development
United Nations Commission on International Trade Law

5. All of the organizations that had been invited, including those that were not able to attend, expressed their appreciation to the Commission for taking leadership in organizing co-operation between the organizations active in this field. Appreciation was also expressed for the fact that in the Commission's invitation it had been stressed that the Commission was specifically not attempting to interfere with the internal decision-making process of any organization and that no decision could come out of the meeting that would require an organization to undertake certain topics or to desist from other topics.

6. It was recognized at the meeting that co-operation was both important and, in some respects, difficult. It was important because the introduction of automatic data processing in international trade, through the use of computers and their inter-connection by telecommunications, created legal problems that could seldom be solved by any one organization. Therefore, co-operation was necessary, not only to ensure that organizations were not working in conflict with one another, but because certain problems can be solved only through efforts taken from several points of view. It was, however, acknowledged that co-operation was sometimes difficult to achieve because of the differences in the organizations as reflected in their fundamental concerns, approach to legal problems, membership and working methods.

7. At the end of the meeting there was general agreement that the exchange of information that had taken place between the participants was in itself one of the most useful forms of co-operation as it would permit the organizations to carry out their individual programmes of activity in a manner that was most likely to lead to consistent results.

8. The hope was expressed that a similar meeting would be organized by the Commission within the next year or two, depending on developments. It was hoped that additional inter-governmental and international non-governmental organizations that might be interested in the legal problems arising out of the use of automatic data processing in the field of international trade would be in contact with the Commission's secretariat so that their activities could be reflected in future reports and so that they may be invited to future meetings.

II. Activities of other organizations

9. The information on the work of other organizations was largely, though not exclusively, made available at or in conjunction with the co-ordination meeting.

A. *International Maritime Organization (IMO)*

10. The main activity of the IMO related to legal problems arising out of the use of automated data processing is in respect of the Convention on Facilitation of International Maritime Traffic (London, 9 April 1965, as amended). As noted in the report of the Secretary-General submitted to the nineteenth session of the Commission (A/CN.9/279, para. 30), a number of amendments to the Convention designed to permit the use of automatic data processing techniques entered into force on 1 October 1986.

11. It was pointed out that the Facilitation Convention did not purport to establish binding legal rules. Instead, it established standards that the international community agreed would facilitate international maritime traffic, requiring each Contracting State to indicate which of the standards it was not prepared to implement. Therefore, the entry into force of the recent amendments to the Convention does not necessarily mean that data processing techniques will be used for the documentation required in States parties to the Convention. Nevertheless, the entry into force of the amendments was expected to lead to wider acceptance of such documentation.

B. *United Nations Economic Commission for Europe (ECE)*

12. The ECE Working Party on Facilitation of International Trade Procedures is currently engaged in studies aimed at replacing paper documents by modern methods of data transmission. Universal syntax rules for "Electronic Data Interchange for Administration, Commerce and Transport" (EDIFACT) were recently

approved by the Working Party; they are now circulated as a draft Standard of the International Organization for Standardizations (ISO). Although of a technical nature, some of the components of the syntax rules (e.g. the United Nations Trade Data Elements Directory, UNTED) might contribute to the harmonization and unification of international trade law by providing internationally agreed, precise trade "data elements".

13. Other studies concerning new methods of data transmission include the utilization of microcircuit ("smart") cards in various sectors, for instance to replace traditional paper bills of lading. Under the auspices of the ECE Inland Transport Committee, a feasibility study is being undertaken on the utilization of such a device for the facilitation of road transport procedures. Trials might be undertaken in the near future to replace TIR Carnets (which cover customs transit of goods carried by road vehicles or in containers) by a microcircuit card which would provide a link between trade data electronically interchanged and the physical transport operation.

14. Another field of research covers the replacement of negotiable documents, more specifically the bill of lading, by non-negotiable instruments more suitable for automatic data transmission because they would overcome the legal problems associated with the "symbolic" value of bills of lading. In the course of its efforts to promote the use of sea waybills instead of bills of lading, the ECE Working Party found that some problems of liability and the incorporation of general conditions of transport hampered their utilization in practice. This issue is now under study in the framework of the Comité Maritime International.

C. *International Chamber of Commerce (ICC)*

15. At the request of the ECE Working Party on Facilitation of International Trade Procedures, ICC had undertaken to prepare Uniform Rules for Communication Agreements (UNCA). Those Uniform Rules were intended to provide legal rules available for voluntary adoption by parties to international trade transactions using open communication systems.

16. During the year since the preparation of A/CN.9/279, the Uniform Rules had been significantly revised and had been renamed Uniform Rules of Conduct for Interchange of Trade Data by Teletransmission (UNCID). UNCID was intended to apply only to the procedure for the interchange of trade data effected by teletransmission and not to the substance of the trade data messages interchanged. Although the earlier drafts of UNCA were intended to provide legal rules, it had proven difficult to contemplate how they might become binding on communicating parties except as a result of a prior agreement. Furthermore, it appeared that the needs of communicating parties might differ sufficiently in different environments so that a uniform set of rules was not desirable. Therefore, UNCID is now intended as a code of conduct establishing minimum standards of conduct in the matters it governs.

17. Nevertheless, several user groups had used the draft UNCID in the preparation of rules governing the user group.

18. The current draft of UNCID has been distributed for comment and a meeting has been scheduled for 4 June 1987 to consider the comments. The draft contains provisions on the obligation of the parties to follow agreed interchange standards, duty of care in respect of correctness of transmissions, identification of transmissions, acknowledgment of transmissions, confirmation of content, protection of trade data and storage of data.

D. *International Rail Transport Committee (CIT)*

19. In February 1987 CIT sent to the principal international associations of railroad users in Europe, to international organizations having competence in customs matters and to other organizations interested in the work of CIT a copy of the draft general conditions (*cahier des charges*) for an electronic replacement for the rail consignment note CIM.

20. In the accompanying circular letter CIT pointed out that the desired goal would be for the electronic replacement to be acceptable to banks for use in documentary letters of credit under the Uniform Customs and Practice for Documentary Credits (ICC publication No. 400) and to banks in the States members of the Council for Mutual Economic Assistance (CMEA), where the duplicate of the rail consignment note must always be presented to the bank. For the electronic replacement of the rail consignment note to be practicable, it must also be acceptable to customs officials, with whom CIT is also in contact.

21. At the co-ordination meeting convened by the UNCITRAL secretariat, it was noted that the problems faced by the railroad authorities in establishing an electronic replacement for the rail consignment note acceptable to banks and customs officials would seem to be identical to the problems that would be faced by air and sea carriers in replacing their current paper-based transport documents. The railroad authorities seem likely to be the first to solve these problems. They have authority under the version of COTIF in force since 1 May 1985 to replace the paper-based rail consignment note by an electronic replacement, while the air transport industry must await the coming into force of Montreal Protocol No. 4. They also constitute a smaller and more cohesive group of parties than is available in the sea transport industry and therefore may be better placed to establish the necessary new procedures with the banking industry and with customs officials.

22. It is envisaged that in the beginning the new system will extend to some ten member States of the Convention Concerning International Transport by Rail (COTIF), (Berne, 1980) in Western Europe.

23. Because of the interest in having common solutions to the use of electronic versions of transport documents in banking and customs applications, the Commission's secretariat undertook to bring these developments in respect of the rail consignment note to the attention of

the appropriate authorities of the other modes of transport.

E. *European Communities, Commission of*

1. *Trade data interchange systems*

24. On 1 December 1986 the Commission of the European Communities submitted a Communication to the Council containing a proposal for a Council regulation introducing the preparatory phase of a Community programme on trade electronic data interchange systems (TEDIS) (COM(86) 662 final). The proposal envisages an extensive programme to develop TEDIS throughout the Communities, listing fourteen aims of the preparatory phase. In respect of legal questions, article 3 of the proposed regulation states that the aim is:

"(7) Solving of legal problems that might inhibit the development of trade electronic data interchange and ensuring that restrictive telecommunications regulations cannot hamper the development of trade electronic data interchange;"

25. No action in respect of this proposal can be undertaken until the Council has acted.

2. *Indirect taxation*

26. For the last several years the Commission has been working on plans to link trade circles with tax authorities by data transmission. In developing the administrative requirements for such matters as authentication of messages, retention of electronic documents (especially those of a commercial nature necessary for audit purposes) and evidence, it became evident that the concerns of the tax authorities were essentially the same as those of the trade parties in regard to their messages between themselves. The principal difference was that the administrative authorities could not take all of the risks that commercial parties could take and, therefore, required a higher degree of legal security.

27. In order to determine with more precision the legal situation in the member States of the Communities, a study was expected to be undertaken, with the aid of national experts, on such matters as evidentiary requirements in civil and administrative litigation and rules of law requiring the use of paper-based documents. In the latter category, special mention was made of the requirements for the retention of paper-based commercial documents for audit purposes by administrative authorities. One example given was the requirement in one country of a paper-based invoice in commercial sales.

28. In the co-ordination meeting it was recognized that this study would constitute a practical application of the UNCITRAL recommendation made by the Commission at its eighteenth session in 1985 on the legal value of computer records.⁴ The study, once completed, would be

⁴ Report of the United Nations Commission on International Trade Law on the work of its eighteenth session, *Official Records of the General Assembly, Fortieth session, Supplement No. 17 (A/40/17)*, para. 360.

of great interest to all future users of trade data transmission within the twelve States of the Communities. It was also recognized that the study would have indicative value to parties outside the Communities, since it would give an indication of the matters they might look for in their own law.

3. *New payment cards*

29. On 12 January 1987 the Commission of the European Communities sent to the Council a Communication on New Payment Cards (COM (86) 754 final). The Communication proposes an initiative to lead to the inter-operability throughout the member States of the Community of payment cards that incorporate magnetic stripes or microcircuits, or both, and that can be used to draw cash from cash dispensers or make payments via terminals installed at points of sale.

30. The initiative deals largely with technical compatibility. In addition, the initiative deals with freedom of cross-frontier payments, competition rules, and certain rules relating to use of cards (role of traders who accept cards; consumer protection). Questions of consumer protection policy in respect of electronic funds transfers are also being studied pursuant to the Council's resolution of 6 May 1986, para. 34 and point 10 of its proposed calendar of actions.

F. *Organization for Economic Co-operation and Development (OECD)*

31. Although OECD is not, as such, involved in legal problems arising out of trade data interchange, it is interested in the work of other organizations in this field. It could consider endorsing the work of other organizations as a means of promoting efforts to reduce legal obstacles to trade data interchange.

32. In 1985, a Declaration on Transborder Data Flows was adopted by the OECD Ministerial Council, in which member Governments declared their intention to:

(a) Promote access to data and information and related services, and avoid the creation of unjustified barriers to the international exchange of data and information;

(b) Seek transparency in regulations and policies relating to information, computer and communications services affecting transborder data flows;

(c) Develop common approaches for dealing with issues related to transborder data flows and, when appropriate, develop harmonized solutions; and

(d) Consider possible implications for other countries when dealing with issues related to transborder data flows.

They also agreed to undertake further work on issues emerging from:

(a) Flows of data accompanying international trade;

(b) Marketed computer services and computerised information services;

(c) Intra-corporate data flows.

The OECD's Committee for Information, Computer and Communications Policy is at present working on some of these issues.

33. In December 1987 a high-level meeting of the OECD's Committee on Information, Computer and Communications Policy will be held that will consider, among other themes, the need for improving international rules of the game in the area of information and communications policy. Under this theme, issues dealing with trade in computer and communication services, privacy protection, trade secrets and other related legal issues including intellectual property protection will be discussed.

G. *Council of Europe*

34. Under article 19 of the Convention for the Protection of Individuals with Regard to Automatic Processing of Personal Data, which came into force on 1 October 1985 for the present five contracting States (France, Germany, Federal Republic of, Norway, Spain and Sweden) a consultative committee was to meet within one year of the entry into force of the Convention, i.e. before 1 October 1986. The committee, composed of representatives of the Contracting States and observers from non-contracting States, held its first meeting in June 1986.

35. According to article 19 the committee is to make proposals with a view to facilitating or improving the application of the Convention, make proposals for the amendment of the Convention and to formulate its opinion on proposals for amendment of the Convention forwarded to it, and, at the request of a party, to express an opinion on any question concerning the application of the Convention.

36. Following elaboration of the Convention in 1981 an inter-governmental committee of experts on data protection has drawn up four non-binding recommendations addressed to the Governments of the member States that interpret the requirements of the Convention in the light of particular problems specific to data processing in a particular sector. The four recommendations adopted to date are:

(a) Recommendation No. (81) (1) on regulations for automated medical data banks;

(b) Recommendation No. (83) 10 on the protection of personal data used for purposes of scientific research and statistics;

(c) Recommendation No. (85) 20 on the protection of personal data used for purposes of direct marketing;

(d) Recommendation No. (86) 1 on the protection of personal data used for social security purposes.

37. The inter-governmental committee of experts is currently studying the data protection problems in the police sector, the employment sector, the data protection of the new technologies and, in the banking sector, the use of microcircuit cards and point-of-sale transfer of funds.