

# CAUSES AND IMPLICATIONS OF PIRACY IN THE SOFTWARE. CASE STUDY

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## **Abstract**

*The paper presents the development of the subject of an intellectual property technical expertise report conducted at the request of a criminal investigation body in relation to software piracy. The technique of making a technical expertise report imposes strict compliance with the required objectives. As a result, the author of the report, who also authored this paper, considers appropriate to extensively study the subject highlighting (i) the endogenous conditions underlying the offense, ii) the exogenous factors that facilitated the perpetration and iii) the resulting material and moral damages. The paper, original and relevant, emphasizes the thoroughness and professionalism needed by the intellectual property technical expert, which often exceeds the specialization of a single faculty on the one hand, and the beauty of this border specialization that combines engineering, economics, law and social sciences, on the other hand.*

**Keywords:** *intellectual-industrial property, copyright, software piracy, competition, unfair competition, illegal behaviour.*

**JEL Classification:** *K14, K23*

## **1. Introduction**

The penetration of IT into the social life is a fact. The use of IT programming in all fields of science has become a must not only to facilitate work but, foremost, to keep pace with the competitors.

An impressive number of domestic norms and regulations, brought in line with the European Directives and in harmony with the international jurisprudence have found their place in the Romanian legislation: Government Decision No. 1007/2001<sup>2</sup> for the approval of Government strategy to computerise public administration and many other regulations on IT and e-commerce commerce: Law No. 365/2002<sup>3</sup> on e-commerce, Law No. 455/2001<sup>4</sup> governing e-signature; Law No. 52/2003<sup>5</sup> governing the decisional transparency in public administration; Ordinance No. 24 of January 30, 2002 regulating the electronic payment of local taxes and dues<sup>6</sup>; Law No. 161 of 2003 regarding certain measures to secure transparency in the exercise of public offices and in the business sectors for the prevention and fight against corruption.<sup>7</sup>

A natural consequence of this is that an ever larger number of specialised works and books refer to this strategic resource so much required for the development of the society<sup>8</sup>, to the copyright aspects in the world of IT systems<sup>9</sup>, to the security of information in general and of the internet information in particular<sup>10</sup>, the use of the internet in the modern recruitment of work force<sup>11</sup>

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<sup>2</sup> Government Decision no. 1007/2001 for the approval of Government strategy regarding the computerisation on public administration, published in the Official Journal no. 705 from 6th of November 2001

<sup>3</sup> Law No. 365 of June 7 2002 on e-commerce Official Journal No. 959 of November 29 2006

<sup>4</sup> Law no. 455/2001 on e-signature published in the Official Journal no. 429 of July 31 2001.

<sup>5</sup> Law no. 52/2003 on the transparency of decisions in public administration, published in the Official Journal no. 70 of February 3 2003

<sup>6</sup> Ordinance No. 24 of January 30 2002 for the cashing-in of local taxes and dues as amended and approved by Law No. 291/2002 published in the Official Journal No. 346 May 24 2002

<sup>7</sup> Law No. 161/2003 on some measures to ensure the transparency in the exercise of public roles in public offices and in the business environment, prevention and punishment of corruption

<sup>8</sup> Gărăiman, Daniela (2003). *Dreptul și informatica (Engl.Law and Informatics)*. Bucharest: ALL BECK Publisher.

<sup>9</sup> Patriciu Victor-Valeriu, VasIU Ioana, Patriciu, Șerban-George (1999). *Internetul și dreptul. (Engl.The Internet and the Law)*. Bucharest: ALL BECK Publisher.

<sup>10</sup> Ciochină Daniela (2013). *Informatisation of Public Services – Strategic Resource in the Development of Society. "Perspectives of Business Law in the Third Millennium" Journal, November 2, 2012, Bucharest University of Economic Studies, Volume No.2 (Issue No.1), pp 55-57.*

and in the general commercial activity<sup>12,13</sup>, to the evolution of IT systems within economic enterprises<sup>14,15</sup>, to specific practices of unfair competition or violations of the law governing the IT field. It is a natural sequel of the omnipresence of IT science in all the aspects and fields of the economic and social life.

The information has become an “economic resource and a service of first necessity subsequent to the increase in the level of computerisation of the industrial processes as well as in the level of use of information in solving social problems...”, because „the possession, manipulation and use of information can improve the cost-efficiency ratio of many physical and cognitive processes”<sup>16</sup>.

The globalisation of the economic activity requests the knowledge of the interdependencies between the various fields of activity and of the ways the compatible economic instruments<sup>17,18</sup> are used in fields which, in principle, are perceived as divergent.

It seems that IT has had the quickest impact and penetration in the field of accounting. The fact that this science has very exact and strict rules obviously facilitated the generation of specific IT programs.

The modern legislation offers not only the ways for the efficient use of this modern instrument but also the possibility to trace back any specific illegal perpetration.

One of the laws that protect the technical IT creation is Law No. 8/1996<sup>19</sup>. In fact this Law protects any and all actual, original creation<sup>20</sup>.

The paper refers to a technical legal expert report in an industrial and intellectual property matter<sup>21</sup>, namely case file No. 242/P/2009 investigated by the Police Department of the county of Prahova, Rumania: “*criminal complaint filed in by the named FV against the named TM for having devised a computerised accounting program by reproducing one of his own without his consent thereby breaching Art. 140, 1<sup>st</sup> paragraph, letter f of Law 8/1996*”.

The general frame was laid out and set in notification No. 242/P/2009 of November 02 2012: the objective of the expertise was to establish the identical or similar elements in the two programs by means of a detailed comparison of the data bases structure, of the programming language and of the relational schematics, etc., including without limitations the interface elements.

## 2. Situation and material assessment

The objectives set by the criminal investigator were: i) a detailed comparison between two computerised accounting programs, namely „SDG CONTABILITATE” and „AVACONT”, to

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<sup>11</sup> Artene Alin, Medinschi, S. (2013). From Traditional Recruiting To E-Recruiting in Public Organizations. *Annals. Economic Science Series, 2013, Timisoara, Volume XIX*, 2013, Eurostampa Publisher, pp.28-33

<sup>12</sup> Kriston Andrea (2013). E-Commerce Terms in Everyday Usage. *Annals. Economic Science Series, 2013, Timisoara, Volume XIX*, 2013, Eurostampa Publisher, pp.359-363.

<sup>13</sup> Martin Florin, Stoica Eduard, Cristescu Marian (2013). Business Development Through E-Accessibility's Growth To Digital Economy. *Annals. Economic Science Series, 2013, Timisoara, Volume XIX*, 2013, Eurostampa Publisher, pp.436-440.

<sup>14</sup> Codreanu Diana-Elena, Răduț Carmen (2013). The Evolution of Information Systems in the Context of Information Society. *Annals. Economic Science Series, 2013, Timisoara, Volume XIX*, 2013, Eurostampa Publisher, pp.147-151.

<sup>15</sup> Cornean Andra-Nicoleta (2013). The Connection Between Economic Information and the Informational System in Credit Institutions. *Annals. Economic Science Series, 2013, Timisoara, Volume XIX*, 2013, Eurostampa Publisher, pp.152-155.

<sup>16</sup> <http://ro.wikipedia.org/wiki/Informa%C8%9Bie>

<sup>17</sup> Fântână Raul Sorin (2011). *Human Resources Management. A Mathematical Image Of The Profession Compatibility – The IX<sup>th</sup> International Conference „Challenges in Higher Education and Research in 21st Century” - English Language Faculty of Engineering, Technical University of Sofia, Sozopol, Bulgaria, 5 June - 8 June 2011, Heron Press, Conference Proceedings, ISBN: 978-954-580-308-6, pp.342-346*

<sup>18</sup>Fântână Raul Sorin, Minculete Nicușor, Precup Radu-Emil (2014). *Extension of Liskov Substitution Principle and Application to Curriculum Management*, Acta Polytechnica Hungarica, Journal of Applied Sciences, Vol. 11, No. 7, 2014, pp.25-42, ISSN 1785-8860

<sup>19</sup> Law no. 8/1996 of the copyright and related rights, published in the Official Journal no. 60 from 26/03/1996

<sup>20</sup> Art. 24/Law No.8/1996: (1) *The copyright in a literary, artistic or scientific work is born from creation, whatever the concrete mode or form of expression.*

<sup>21</sup> Fântână R.S. (2013). Raport de expertiză în proprietate intelectuală, Dosar No. 242/P/2009, solicitant: Inspectoratul de Poliție a Județului Prahova, Serviciul de Investigare a Fraudelor. (Report of expertise in intellectual property, File no. 242 / P / 2009, requested by: Prahova County Police Inspectorate, Fraud Investigation Service.)

establish their identity by revealing any identical or similar elements and the differences between the two; ii) to establish if the computerised “AVACONT” accounting program was devised by modification / adaptation of the computerised “SDG ACCOUNTING” program; iii) identifying other aspects which the expert considers necessary to clarify and settle the case.

The objectives requested by the plaintiff, FV, aimed at establishing the precedence of his program, on one hand, and the way the respondent, TM, hired by FV at TM in 2003 took and used programs and subroutines from the FV program assembly to gain undeserved benefits: i) the design logic of BD tables, Relational Model; ii) the logic of conception and use of the analytical accounts for “Partners” and “Items”, the other accounts included; iii) the design and execution logic of interrogations and, especially, the execution logic of the interrogations for all the versions of accounting balances, charts of accounts (especially the SAH chart, the big log and the chart of corresponding accounts) and accounting journals; iv) the design logic of data input and updating forms/models. In particular: verification of the operation logic for the forma/model for the introduction of accounting notes (the most important form of the application) which uses temporary tables plus the other models which use temporary models; the structuring of the accounting note in documents and operations; v) the design and execution logic of accounting statements; vi) the date of tables, interrogations, forma and statements generation; vii) analysis of the data bases and applications collected from educational institutions and validation of the structural modifications in the period 2006 – 2008; viii) analysis of the call form for SDG Budgetary Accounting applications collected from budgetary institutions (period 2006 – 2008) and verification of the presence of identification and author contact details.

In order to prepare the report, the expert has requested, through the diligence of the criminal investigator, the following groups of detailed data: 1. Application project (file name restriction, application imposed working paths); 3. Table analysis (designations, attributes, primary keys, secondary keys); the parties shall understand that the analysis will not address the form and the standard elements of the tables but their elements as specified between brackets; 4. Analysis of the forms; 5. Analysis of the reports. On the date the expert handed in the report, the criminal investigator provided the expert with: i) two contracts – the first one was dated May 25 2011 and the second dated March 9 2005 – for the purchase by the School Inspectorate of the county of Prahova of software products from the plaintiff’s company; ii) one contract, dated July 1 2008, for the transfer of the copyright from FV to SC DSG Group, his own company; iii) a number of 19 CD’s containing:

- AvaCont – Budgetary accounting program devised and authored by TM, Avatar Soft 2007 version and another version of 2008 – the beneficiaries being several budgetary institutions of Ploiesti, mainly schools, high schools, kindergarten No. 28 of Ploiesti;
- SDG – Financial Accounting program v1.1. (C) 2004 – produced by S.C. Sigma Distribution Group, and S.C. Distribuitor Salamander Group, both owned by the plaintiff, FV,
- Various budgetary users from Ploiesti.

In his initial statement of 06.04.2009, TM acknowledges that as of 2007 he launched a new program which he started to devise in 2006, totally different from the initial program of FV. He shows that he actually gave the program to accountants from a number of accountants from budgetary institutions because the existing program contained a function which, for lack of updating, had rendered the program unusable as of 2007. The concerned institutions could not purchase a second program because such an expense was totally unjustified.

*The legal grounds in the case* were Art. 140, 1<sup>st</sup> paragraph, letter f) of Law No. 8/1996 corroborated with the provisions under Art. 73, 1<sup>st</sup> paragraph, letter b of Law No. 8/1996.

*The legal framework of the assessment given in the technical intellectual and industrial property expert report* is Law No. 8 of March 14 1996<sup>7</sup>, Emergency Government Ordinance No. 123/2005<sup>22</sup>, Ordinance No. 25 of January 26 2006<sup>23</sup> and Law No. 11/1991<sup>24</sup>.

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<sup>22</sup> Government Emergency Ordinance No. 123/2005 amending and supplementing the Law No. 8/1996 regarding the copyright and related rights, published in the Official Journal, Part I, No. 843ofn 19/09/2005

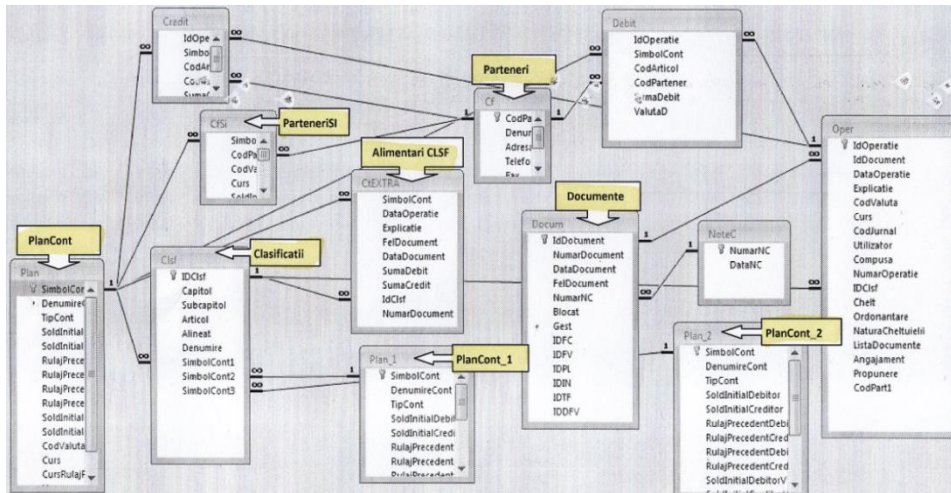


Fig. 1 – Relational Model (RM) of the original SDG FINANCIAL ACCOUNTING program

As regards the qualification for protection of software through the copyright law, the norms set by WIPO provide for: “8.14 the works qualified for copyright protection are, as a general rule, all original intellectual works. A non-exhaustive exemplifying list of such work is covered by the national laws governing the copyright. ... The work is protected irrespective of the quality of its contents of form and, also, when it has little in common with literature, art or science, such as purely technical instruction books or engineering drawings or even maps ...”<sup>25</sup>.

The expert has received material from either party.

The Relational Model (RM) analysis revealed that an important number of RM positions of SDG (the original work) are to be found in the RM of AVATAR SOFT (object of the expert report). The elements in the cases flagged with an arrow in Figure 1 are found in the structure of AVATAR SOFT in Figure 2.

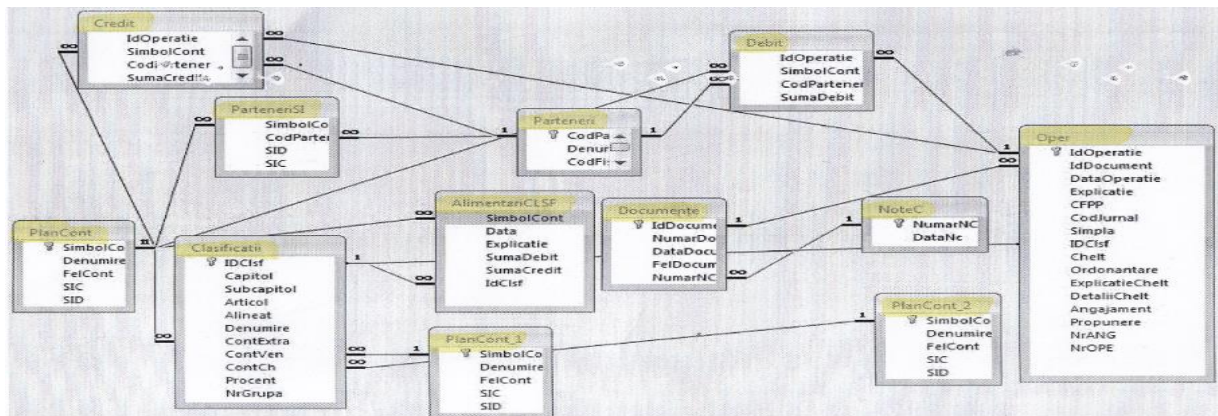


Fig. 2 – The Relational Model (RM) of AVATAR SOFT (expert subject)

The study of the relational models of the two software programs presented in Figures 1 and 2, after a simple relocation – cases moved around with the mouse – and after dissimulating (by means of key HIDE) certain cases which are not of interest, reveals (Table 1) that, under sometimes different designations of the subprograms, each such subprogram opens numerous subprograms

<sup>23</sup> Ordinance No. 25 of 26/01/2006 regarding strengthening the administrative capacity of the Romanian Office for Copyright, published in the Official Journal No. 657 of 18/09/2008

<sup>24</sup> Law No. 11/1991 on combating unfair competition, published in the Official Journal No. 24 of 30/01/1991, modified by Law No. 298/2001 amending and supplementing the Law No. 11/1991 on combating unfair competition.

<sup>25</sup> WIPO/OMPI. (2001). *Introducere în Proprietatea Intelectuală (Engl. Introduction to Intellectual Property)*, Rosetti Publishing, Bucharest, p.144

with identical designations. Three examples are given below: Credit vs. Credit; CtExtra vs. CLSF inputs, and Oper vs Oper.

Even the contents of the two RM’s have several common elements (Table 1).

**Table 1 – Comparison between the component elements of the SDG Relational Model (original) and of the AVACONT Relational (object of the expert report)**

SDG FINANCIAL ACCOUNTING (original software)	AVACONT (software submitted for expert assessment)
<b>Credit</b> <u>IdOperatie</u> <u>SimbolCont</u> Cod Articol <u>CodPartener</u> <u>SumaCredit...</u>	<b>Credit</b> <u>IdOperatie</u> <u>SimbolCont</u> Cod Articol <u>CodPartener</u> <u>SumaCredit...</u>
<b>CtEXTRA</b> <u>SimbolCont</u> DataOperatie <u>Explicatie</u> FelDocument DataDocument <u>SumaDebit</u> <u>SumaCredit</u> <u>IdClsf</u> NumarDocument	<b>Alimentari CLSF</b> <u>SimbolCont</u> Data <u>Explicatie</u>  <u>SumaDebit</u> <u>SumaCredit</u> <u>IdClsf</u>
The identical use of either <b>Id</b> or <b>ClsfId</b> . See below.	
<b>Oper</b> <u>IdOperatie</u> <u>IdDocument</u> <u>DataOperatie</u> <u>Explicatie</u> CodValuta Curs <u>CodJurnal</u> Utilizator Compusa NumarOperatie <u>IDClsf</u>  <u>Ordonantare</u> <u>NaturaCheltuieli</u> <u>ListaDocumente</u>  <u>Angajament</u> Propunere CodPart	<b>Oper</b> <u>IdOperatie</u> <u>IdDocument</u> <u>DataOperatie</u> <u>Explicatie</u> CFPP  <u>CodJurnal</u> Simpla  IDClsf Chelt <u>Ordonantare</u> <u>ExplicatieChelt</u> <u>DetaliiChelt</u>  Angajament NrANG NrOPE
It should be noted that the same use of ID with IdOperation and with IDClsf	

When studying the relationships we can notice numerous identical and similar elements between SDG and AVACONT software (Figures 1, 2 and 5).

When defining the tables and dates (Figure 3) we can notice that the date of generation is December 29 2006, 06:51:11 hours. Or, it is impossible to create such a large number of definitions at the same hour, minute and second.

Although the table *model si standard*, the relational model is unique. But the assessment reveals the same attributes and restrictions both in the SDG and the AVACONT software programs. Although Figure 3 shows only 3 pages, the Expert Report counts 22 pages of which 15 pages have the same generation date, i.e. December 29 2006 and the time is the same, i.e. 06:51:11.

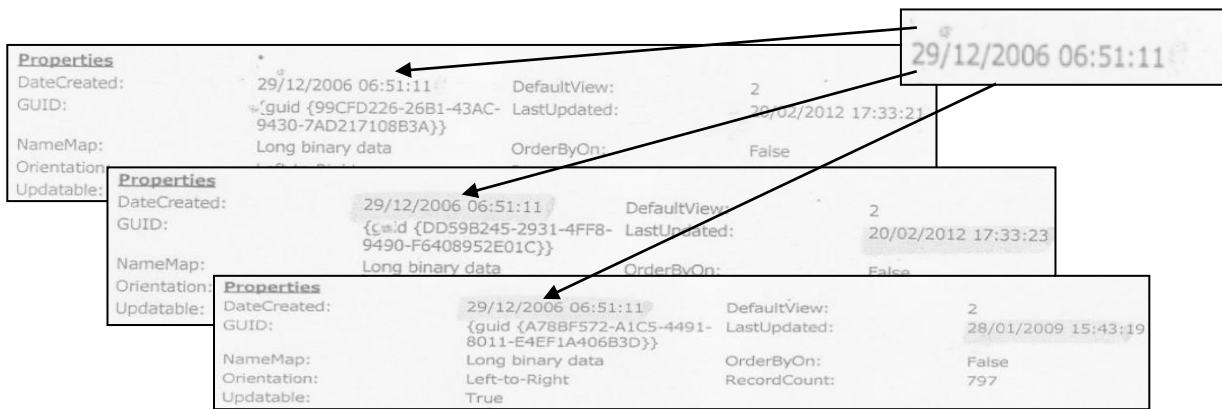


Figure 3 – The date of file generation with TM’s AvatarSoft (object of the expert report) is december 29, 2006, 06:51:11 hours which is totally abnormal and impossible. This is the date when the files have been taken over by the respondent („generated” in a portable memory, such as a flash drive) and modified on the date entered next to the files, to the right (LastUpdated).

Figure 4 (extracts from pages 11, 17 and 18 and Annex 5 in the Expert Report) shows the generation date of the objects from MsysAccessObjects application which was April 6 2000, 17:49:34 hours. But at the time, TM did not work for FV’s company, SDG.

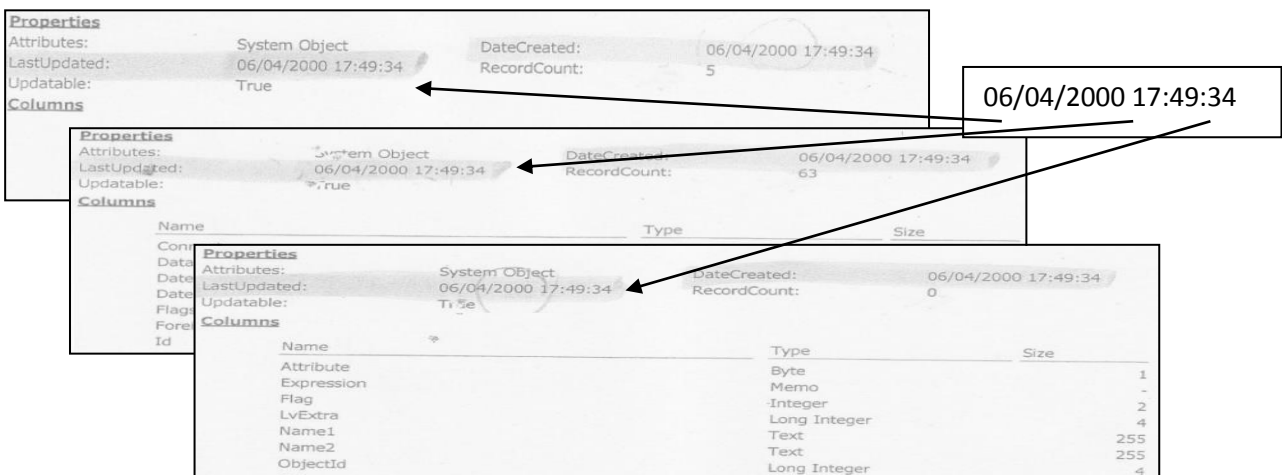


Figure 4 – Extracts from pages 11, 17 and 18 of Annex 5 of the expert report showing the generation date of the objects in MsysAccessObjects application, namely April 06 2000 17:49:34 hours.

Following the analysis of the material submitted by the criminal investigator and by the two parties – CD’s with *SDG Financial Accounting* (original) of FV and “AVACONT” (object of the Expert Report) of TM, the expert identified a large number of identical and similar elements in the six groups of data that were examines, which represents some 60-70% of the information.

Therefore, it can be concluded that the accounting software “AVACONT” was created by modifying/adapting the “SDG FINANCIAL ACCOUNTING” software.

### 3. Outline of the involved parties and players

As regards the technical intellectual property aspects in the case, the expert deemed necessary to provide the following clarifications:

Definitely, the clients of FV (rightful owner of the entire software program), the companies through which FV unfolded his activities, knew that “hacking” the password to the SDG software program which they purchased from FV, or the acceptance that somebody else - TM as named in the case file – constituted i) a dishonest act, ii) the use of unfair procedures by knowingly purchasing *trade secrets* thereby jeopardising the market position of the competitors. *The competitors’ market position* should be understood as the relative position between the “seller of the SDG product” and the “AvaCont product seller”.



SDG FINANCIAL ACCOUNTING  
 C:\Contabilitate\20\baza.mdb  
 (original, ANNEX 3)

versus

AVACONT  
 C:\Contab\1\y.mdb  
 (ANNEX 4)

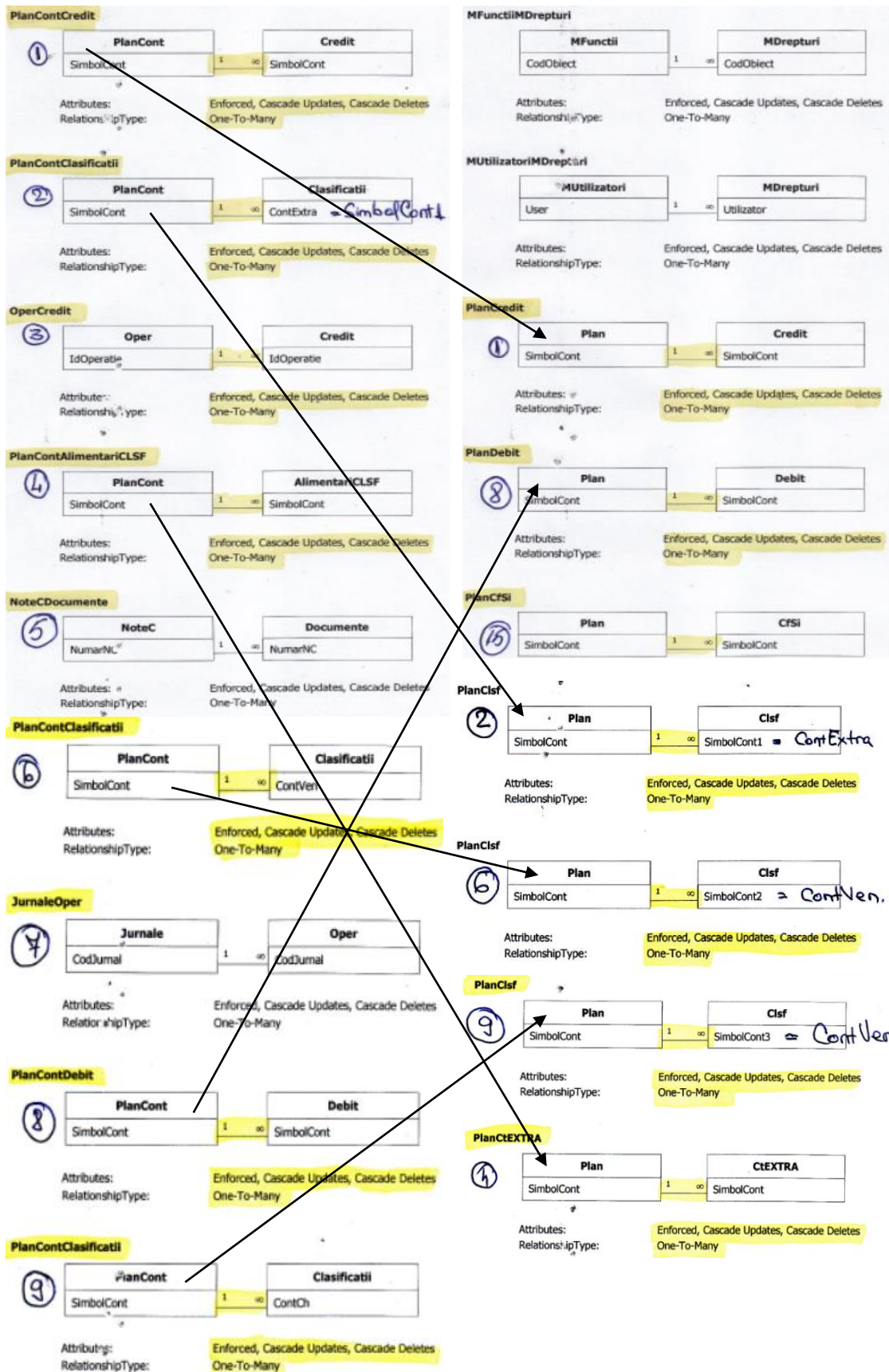


Figure 5 – Identical elements in RM: SDG original/left vs. AVACONT reproduction/right

It is absolutely clear that the *code and specific principle information* related to the *SDG Financial Accounting* program were *trade secrets*, as long as the information in the program, in their whole or in as much as their elements are exactly interconnected, were generally neither known nor easily accessible to the persons dealing with this type of information on a regular basis and which gained a commercial value by simply being trade secrets and the holder – through the access code/password – took reasonable measures, considering the circumstances, to maintain the secret character; the protection of the trade secret operates only as long as the aforementioned requirements are fully met.

For the application that was installed at the budgetary institutions, the author of *SDG* software program had secured, according to the Law, the protection by the use of passwords and by restrictions embedded at code level which were intended to limit the running of the application beginning with January 2006.

The actual situation demonstrates the restriction imposed on the use of *SDG* Budgetary Accounting, the running until December 31, 2005, respectively, was eliminated and the date set for decommissioning was postponed for a period which allowed the restriction free use of the application. The only one to know the codes was *TM* because he was the only specialist sent every time the program needed amending.

After leaving *SDG*, *TM*, together with *DA* – also former *SDG* employee – established a company under the name *MayG* which, on grounds of contracts signed with the same budgetary institutions, have provided the servicing of the *SDG* budgetary accounting software program thus violating the property rights of the holder, *FV*. Servicing is to be construed as a set of activities intended to modify the security features of the program and to amend the results obtained in compliance with the objectives stated by the budgetary institutions which used the application as well as to change the term set for the time limitation of the application.

It was not the budgetary institution that accessed the security part of the software program but *TM*, the only one to know the password.

The fact that the original program of *FV* was more expensive (as compared with the reproduced and modified program of *TM*), or that the program was about to be upgraded did not mean that the beneficiaries had the right to breach the law. They could have negotiated the price and the contractual terms. The statements submitted to the case file show no evidence that any of the former users of the *SDG* Financial Accounting software program – now users of the *AvaCont* program, had negotiated with *FV*. Or, these facts, exactly, constitute offenses as provided for under Art. 5, letter (f) of Law 11/1991<sup>26</sup>, committed by *TM* as legitimate holder of the respective secrets and of the secrets of his former employer's clients especially so by the relations established with this clientele thanks to his former position within the organisation of his employer, *FV*.

It is clear that we have here two works resulting in two software programs strictly intended for use in the field of the accounting of budgetary institutions, of which *TM*'s program is obviously a derived software program. Neither program must be entered in the national *ORDA* registers since the computer programs and their updates are destined for the internal use of institutions, organisations or economic entrepreneurs providing they are not distributed through commercial outlets; the same provision apply to custom made software programs which are to be used by the beneficiary of the which are not affected by the provisions under Ordinance 25/2006.

It cannot be contested that *FV* is the author of the "*SDG Financial Accounting*". At the same time it cannot be contested that *TM* is author of the "*AvaCont – Accounting Program*", derived from the work of *FV*.

By using his work, author *FV* has the right to challenge any modification brought to his work and to decide in matters regarding the use of his work by others, including the generation of a derived work. *FV* can, therefore, challenge not only the use of any derivative work of/by *MT* and even the execution of such work.

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<sup>26</sup> Art. 5 of Law No.11/1991: « It is crime punishable by imprisonment from six months to two years or fine (...) f) the disclosure or use of trade secrets by persons belonging to public authorities and persons authorized by the legitimate owners of these secret in order to represent them before public authorities; (...) »



This was not a case of distribution of the *SDG Financial Accounting software program*. Notwithstanding its unique structure, the program has been customised for each and every separate beneficiary.

The work of FV was achieved in time which means *different days, different hours, different minutes and different seconds*. This is not the case of a large part of TM's work which contains a large number of tables and data which were generated on the same date and at the same time. – ("Date created on December 29 2006 at 06:51:11"). Or, such an exploit is only possible only in case of a copy/paste type data transfer.

The patrimonial rights of the *SDG Financial Accounting software program* have not been transferred to anyone. Therefore no beneficiary of the program could not claim the possible implications of a right transfer process.

If TM had wished to transform FV's initial work without his consent and free of charge this could have been possible only if the work had not been rendered available to the general public and if the transformation had been imposed by the purpose of use allowed by the author FV. Or, contracts signed by SDG with his beneficiaries provide as follows: „None of contracting parties has the right to transfer its rights and obligations hereunder to a third party without the written consent of the other party”<sup>27</sup>. „SDG is to be deemed as the only provider of maintenance, repair and configuration services for the *SDG Financial Accounting application*”<sup>28</sup>. „In case the Beneficiary calls in a hardware or software services provider in order to service the work stations using *SDG Financial Accounting application* without any prior notification to SDG, the Supplier is entitled to cancel and annul the warranty period”<sup>29</sup>.

The Beneficiaries were awarded only the usage right of the *SDG Financial Accounting program* which does not imply transfer of copyright.

The modifications brought by the budgetary beneficiaries through TM to the *SDG Financial Accounting program* were not aimed at correcting some program errors.

The employee who authors a computer program – as part of his daily routine – has obligations different from any other inventor. In our case the patrimonial rights belong to the employer which, as holder of special rights according to the law<sup>30</sup>. We have shown that the *SDG Financial Accounting programs* were customised for each beneficiary so that there are eventually only two identical programs and therefore we cannot speak about the *reproduction of the program*.

The *SDG Financial Accounting program* has a tutorial that contains information on the copyright status.

#### 4. Technical considerations

For the assessment of the case file and of the creative technical contribution of the authors, the expert requested the parties to submit the conceptual model of the software program which demonstrates the thinking of the designer. Usually, such a logical scheme is the starting point of any system. It offers the possibility to identify the structural interdependences, the unwished crossings and the impossible relations.

Mr. MT has submitted nothing.

The author of *SDG Budgetary Accounting*, Mr. FV, presented his design concept as follows:

- ✓ Concept vision → Data Conceptual Model – DCM (fig.6)
- ✓ Logic vision → Data Logic Model - DLM
- ✓ Physical vision → Data Physical Model – MFD.

<sup>27</sup> With permission from the contract.holder.

<sup>28</sup> With permission from the contract.holder.

<sup>29</sup> With permission from the contract.holder.

<sup>30</sup> Art. 74/Law No.8/1996 - *Unless provided otherwise, the economic rights of copyright in computer programs created by one or more employees in exercise of their duties or as directed by the employer, belong to the latter.*

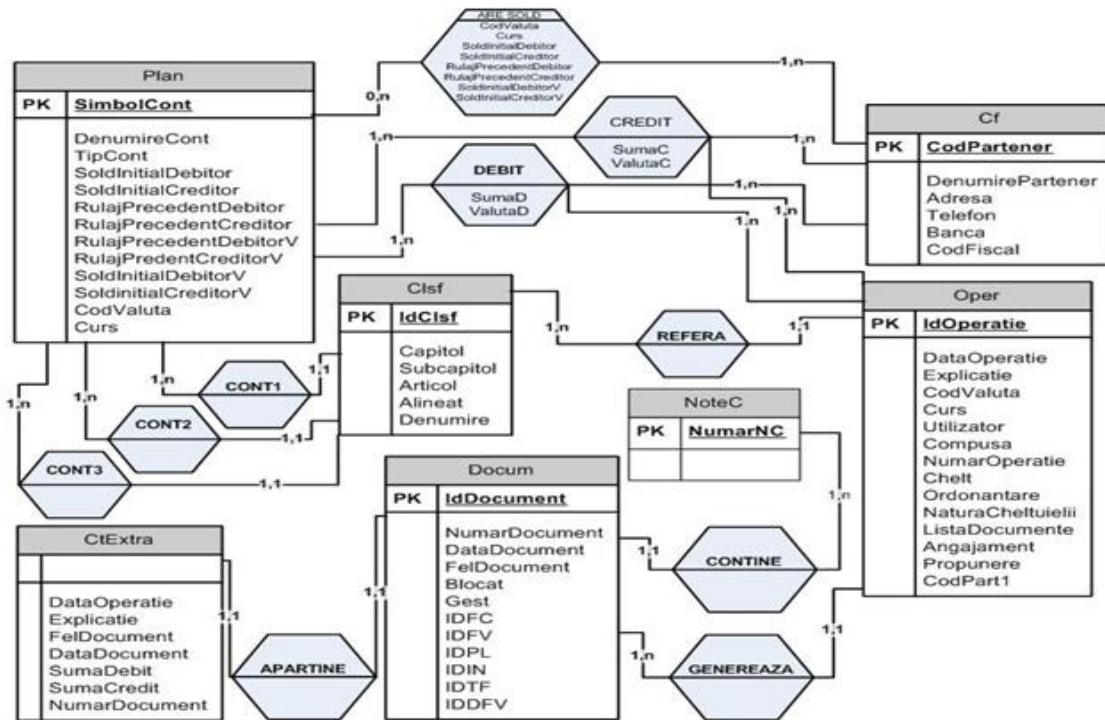
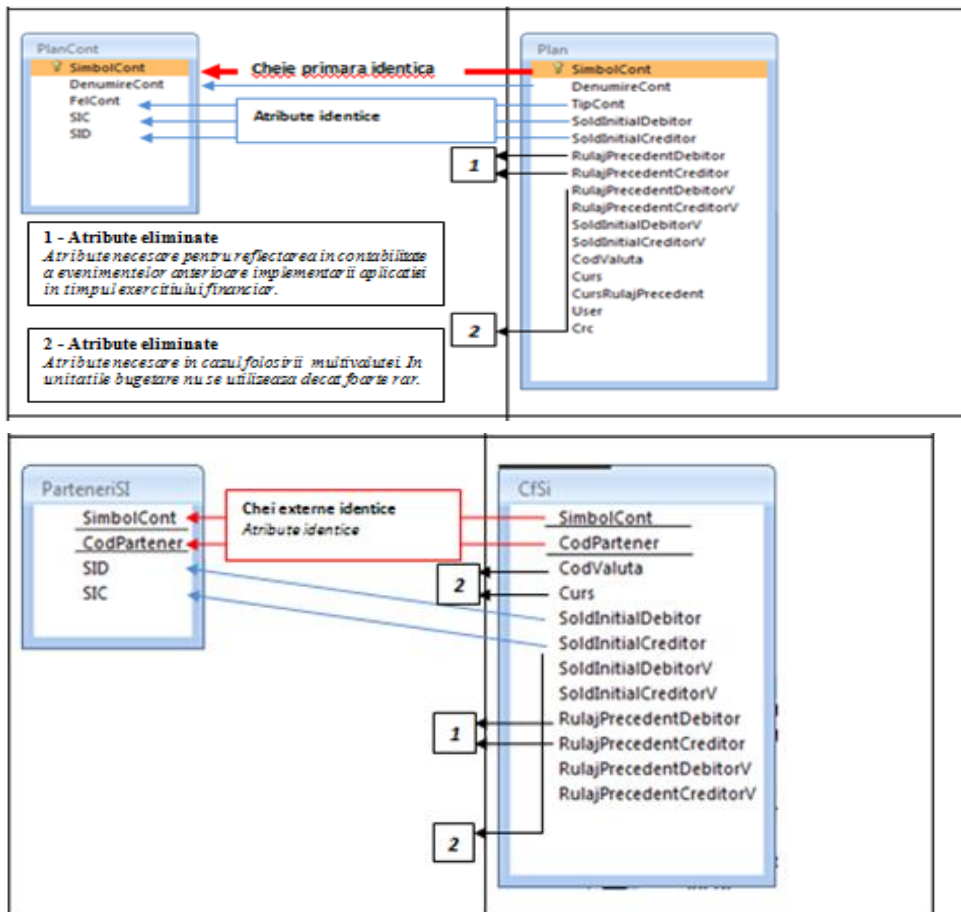


Fig.6 – Conceptual model of data submitted by the plaintiff FV – SDG program

### 5. Comparative analysis of tables and of the primary and external keys

The comparative analysis of the tables, attributes, primary and external keys revealed the 10 similarities highlighted in the report of which only 2 are shown in Figures 7a and 7b below.



Figures 7a and 7b – Comparative analysis of tables, attributes, primary and external keys which highlighted the similarities between the programs compared in the expert report.

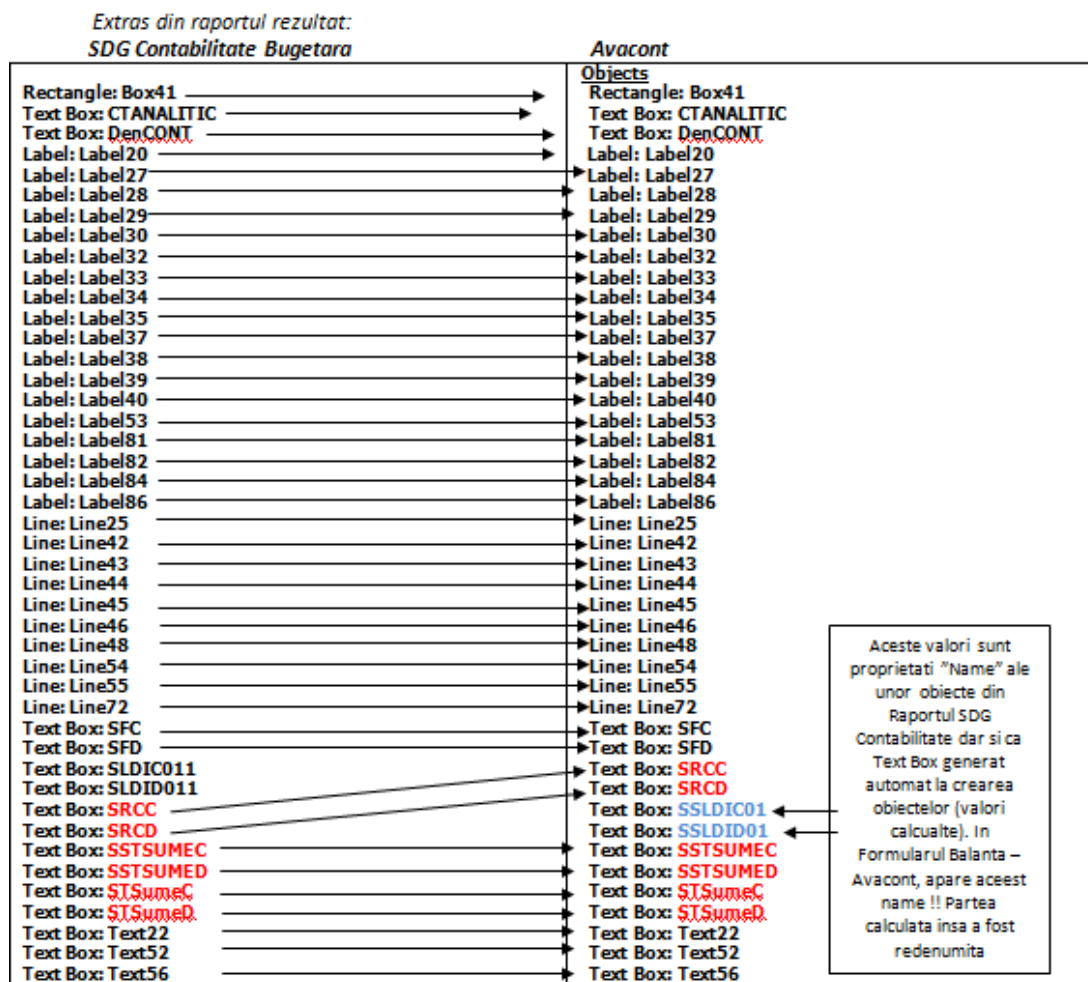


Figure 8 – Comparison of each „Label” element and of the subroutine rows which demonstrates the fact that TM borrowed in the Avatar Soft program from the SDG program of FV.

The SRCC, SRCD, SSTSUMEC, SSTUMED, STSumeC, STSumeD values indicate, through their form originate from the SDG Budgetary Accounting application (Figure 8).

### 6. Conclusions

1. From the detailed comparison between the accounting software programs „SDG Contabilitate Financiară” and „AVACONT”, it obviously results that borrowing without any legal grounds a large number of specific elements (over 70%) from the „SDG Financial Accounting” in the AVACONT program constitutes offense as provided for under Art. 140 1<sup>st</sup> paragraph, letter f) of Law No. 8 of 1996. The identical and similar elements have been highlighted.

2. The programs are not identical. But it is obvious that the AVACONT program is a creation derived from the SDG Financial Accounting. The AVACONT accounting software program was devised by modifying/adapting the „SDG Financial Accounting” software program.

3. The study of other aspects which the expert considered necessary for the clarification of the case, revealed the followings:

i) Neither Mr. TM nor his clients have observed the lawful provisions governing the trade secrets as provided for in Law No. 11 of 1991, Art. 5.

ii) Through his actions, Mr. TM using the knowledge acquired in the period he worked for SDG diverted the clientele of his former employer, Mr. FV, by using the contractual relations of his employer with the beneficiaries (Loi 11 of 1991, Art. 4, letter g).

iii) No ORDA registration obligation was imposed on either of the works because software programs and their updating were intended for the internal use of the beneficiaries,

institutions, organisations or entrepreneurs providing they were not sold through commercial outlets; these provisions also apply to custom made software programs which are to be sued by the beneficiary of the order which are excepted from the provisions of ordinance No. 25/2006. Therefore, the registration or non registration with ORDA is irrelevant in the case at hand.

iv) In as much as TM had wished to transform FV's initial work without his consent and free of charge this could have been possible only if the work had not been rendered available to the general public and if the transformation had been imposed by the purpose of use allowed by the author FV. The beneficiaries were awarded only the usage right of the SDG Financial Accounting program which does not imply transfer of copyright.

(v) We have shown that the employee who authors a computer program – as part of his daily routine – has obligations different from any other inventor. In our case the patrimonial rights belong to the employer, as holder of special rights according to the law<sup>31</sup>. We have shown that the SDG Financial Accounting programs were customised for each beneficiary so that there are eventually only two identical programs and therefore we cannot speak about the reproduction of the program.

(vi) From the technical point of view, the situation in the case – as it results from the detailed examination of the evidence, over 3,000 pages, clearly point out to a derivative creation, to the violation of trade secrets and to clientele diverting.

4. There is a *complex of causes* that contributed to such an aggregation of infractions: i) the respondent ignored the lawful provisions governing the copyright applied to software programs; ii) the former employee ignored the lawful provisions regarding unfair competition; iii) the clients – budgetary institutions in this case - did not know the lawful provisions governing unfair competition; iv) the poor response of the competent antifraud organisations to the violation of copyrights; there is an unhealthy Romanian habit regarding piracy and plagiarism. The majority of case files were finalised with penal fines. There is neither fear of consequences nor respect for employers, experts of police and the budgetary institutions know that they are safe in front of the law. Law suits take very long before damages are recovered only through the painstaking efforts of the hurt party who has to overcome the inertia of the state bodies called to settle the matter.

5. As regards the *implications*, they are important and substantial: i) in a period when employment is very scarce the entries in the criminal record constitute an insurmountable barrier when looking for a job; ii) pecuniary damages are high. In our case, real damages can amount to millions of RON attributable to the former employer and to the budgetary institutions and to their culpable employees. *Real damages* can represent the difference between the initial contractual price and the price of the derived creation. The possible *moral damages* are also important in matters regarding intellectual property and there are several modern calculation methods that can be used; iii) as long as the previous owner of the copyright may not be called when renewing a contract, a company has to be sought to devise a new software program which may be a time consuming process involving creation of the program, the purchase on auction and new acquisition costs.

6. According the provisions under Art. 1 of Ordinance No. 66/2000<sup>32</sup> for the organisation and exercise of the profession of intellectual property advisor: (...) (3) *The field of industrial property deals with patents ...and fights unfair competition.*” Therefore, the expert in intellectual-industrial property is called to formulate conclusions in matters of unfair competition the activity being governed by Law 11/1991.

The specialised culture in the field of expertise, in intellectual property in this case, imposes that the expert be given comprehensive and relevant information.

This information contains specialised works, treatises, case presentation, interpretation of the laws by articles and studies wrote by specialists in this field as well as by specialists in Law.

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<sup>31</sup>Art. 74/Law No.8/1996 - *Unless provided otherwise, the economic rights of copyright in computer programs created by one or more employees in exercise of their duties or as directed by the employer, belong to the latter.*

<sup>32</sup> Ordinance No. 66 of 17/08/2000 on the organization and exercising the profession of industrial property attorney, published in the Official Journal No. 395 of 23/08/2000

One thing that is worth highlighting is that even the examination taken for the licence of expert is based on norms of the Law with the mention that here we talk about the intellectual property law, Civil Code, Civil Procedure Code, Criminal Code and Criminal Procedure Code and others.

The Court proceedings have often raised the question whether or not the expert is a judicial specialist and whether or not he can provide legal precedents to be used in the assessment of the facts which are, however, not mandatory in Romania where the jurisprudence is not considered a source of law. „The Informative Guide for the technical legal expertise” published by the Ministry of Justice (Twinning Program RO2007/IB/JH-11 TL) mentions: „*To acknowledge the importance of a functional law abiding state, characterized firstly by a quick and efficient judicial practice ensured by independent courts and of the legal security as base for a viable social and economic union, we have closely looked into problems pertaining to the activity of legal experts*”. This paper underlines “...*the almost nonexistent knowledge of the legal aspects for lack of seminars on such topics intended for the legal experts. The training and refreshment of the legal experts are totally insufficient*”.<sup>33</sup>

In other words, the legal experts should be the ones to be accused for not having and not using the legal knowledge available. „...*The assessment of the specialty knowledge required for an expert is, hence, a matter of the assessment of the evidence*”<sup>34</sup>. Therefore, we have here a matter of interpretation.

„*The legal expert is an autonomous, adjacent body of the court under the pledge of objectivity who provides the court – in his capacity as consultant – the specialty knowledge from fields outside the scope of the courts, and the expert report – used as evidence – determines the factual knowledge to be acquired*”<sup>35</sup>.

So, the legal expert is a legal entity with all the specific rights and obligations.

The two parties had the possibility to lay out their arguments through the submitted evidence. Unfortunately, the evidence submitted by TM makes no reference to the program section which he was interested in and fails to challenge with good reasons the data offered by the plaintiff. On the contrary the evidence submitted by TM supports the conclusion that the information had been obtained in a fraudulent way; obviously, the criminal investigator based its decision on these facts; all the expert had to do was to assess, within the scope of his competence, the evidence submitted by the two parties.

The material submitted by TM is correct but unfit and too general for the situation and, therefore, of no relevance for his defense. Wishing to demonstrate that the comparable elements offered by him are not subject to any law provided protection Mr. TM failed to bring forth arguments against the allegations of the plaintiff which related to the more refined and more complex levels of the assembly of the software program. Following the assessment given in the expert report, Mr. TM demonstrates that he knows the object matter of the case but the entire material submitted by him contains not a shred of evidence in his favor but only criticisms against the serious comparative elements, the only elements in the entire case file, and against the competence of the expert, in a total disregard for the expert’s obligations as imposed by the Law.

Although the expert, author of this paper, did not follow up the finality of the criminal case, he considered that this matter is of a real interest. As laid out in a previous paper<sup>36</sup>, generally, the expert report and, in particular, is a literary work in a wider sense, a scientific and technical work<sup>37</sup>, a

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<sup>33</sup> „*Informative Guide on legal technical expertise*” published by the Ministry of Justice, Twinning Programme RO2007/IB/JH-11 TL, p.18.

<sup>34</sup> *Idem*, p.20

<sup>35</sup> *Idem*, p.27

<sup>36</sup> Fântână Raul Sorin, *The Copyright on the Intellectual Property Expert Report. Consequences*, publicat in *Perspectives of Business Law Journal*, Volume 2, Issue 1, November 2013, pp.96-100, ISSN 2286 – 0649, ISSN-L 2286 – 0649, ASE Publishing.

<sup>37</sup> Eminescu Yolanda, *Dreptul de autor, Legea nr.8 din 14 martie 1996, comentată* . (Engl.*The Copyright Law, Law No.8 of 14/03/1996 commented*, Lumina Lex Publishing, Bucharest, 1997, p.88.

„work [N.B. protected by the copyright law] to give a technical explanation”<sup>38</sup>, an „original form in which the expert expresses his thoughts”<sup>39</sup>.

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<sup>38</sup> Romițan Raul Ciprian (2006), *Protecția penală a proprietății intelectuale*, C.H. Beck Publishing, Bucharest, 2006, p.73, referring to Decision of 2/08/1870 of Appeal Court Paris, apud B.I.Scondăcescu and al.

<sup>39</sup> Ibidem, referring to Decision of 7/05/1928 of Appeal Court Paris, in Gazette du Paris, 1929, p.264, apud B.I.Scondăcescu and al.