Dalhousie Journal of Legal Studies

Volume 8 Article 4

1-1-1999

Managing the Y2K Risk: Directors' and Officers' Liability for the Year 2000 Computer Bug

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MANAGING THE Y2K RISK: DIRECTORS' AND OFFICERS' LIABILITY FOR THE YEAR 2000 COMPUTER BUG

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The Year 2000 computer bug is more than a technical problem: it poses grave business risks and legal liabilities for a number of actors. In this article, the author examines the potential liability of corporate directors in Canada for Year 2000 problems affecting the corporations they serve. The article focuses on the duties imposed on directors under the Canada Business Corporations Act *and the remedies available to shareholders in the statute. Additionally, the author draws an analogy between the potential defenses that may be available to directors targeted in Year 2000 litigation and the due diligence defense as it is used in environmental and computer virus cases. The author concludes that although the likelihood of Year 2000 litigation is high, so is the likelihood that directors will be able to launch successful defenses to the litigation through statute and common law.*

Le problème de l'informatique de l'an 2000 est plus qu'un simple problème technique. Il pose de graves risques pour les entreprises et entraîne une responsabilité légale pour un grand nombre d'acteurs. Dans cet article, l'auteure examine les responsabilités possibles pour les directeurs des corporations au Canada à l'égard de ce problème. L'article se concentre sur les responsabilités imposées aux directeurs en vertu de la Loi sur les Corporations Commerciales *et les recours disponibles aux actionnaires. De plus, l'auteure démontre l'analogie entre les défenses qui peuvent être disponibles aux directeurs et la défense de "prudence et diligence" utilisée dans les cas de virus*

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† B.A. Hons. (Carleton), LL.B. anticipated 1999 (Dalhousie). The author is indebted to Professors Christopher Nicholls and Michael Deturbide for their valuable comments. The author also gratefully acknowledges the research assistance of Marcia Mills and Cindy McGann, both corporate counsel at Corel Corporation, and the assistance and good will of Julian Eglestaff.

informatiques. L'auteur conclut que les probabilités des problèmes de l'an 2000 sont élevées. Il y a aussi probabilité que les directeurs seront capables d'obtenir avec succès des défenses pour les litiges à travers le droit statutaire et la common law.

There is a new type of directors' and officers' liability case on the horizon, and as the millennium draws closer, the time is ripe for companies to prepare for litigation. The Year 2000 bug has the potential to cause harm to businesses, consumers, shareholders, and if shareholders's litigation is successful, directors and officers. This paper will examine the technical problem, the impact this problem has on computer systems, and the resulting legal problems of liability for directors and officers in Canada.

In particular, this paper will discuss the type of claim shareholders may bring against the directors and officers, and the standards that those directors and officers will likely need to meet. The *Canada Business Corporations Act* [hereinafter *CBCA*] is used to illustrate directors' liability under federal jurisdiction, although readers should be aware that similar provisions govern corporations incorporated in provincial jurisdictions. A discussion of the defenses available to directors will follow, including a possible Canadian adoption of the U.S. "business judgment rule," the use of expert reports, as permitted in the *CBCA*, and the defense of due diligence. Since the problem is still theoretical, there is no case law available directly on point. However, analogies can be made to the use and applicability of the due diligence defense in environmental cases and computer virus cases. An examination of what the due diligence standard will require in this specific instance will follow. Once this review of standards, legislation, and case law is complete, the paper will attempt to predict the probable outcomes of Year 2000 litigation.

I. Y2K: A Brief Technical Explanation

What is required of directors, officers, and their staff will be directly guided by the types of technical problems they encounter with the computer bug and the nature of their business. Therefore, while the focus of this paper will be on the legal liabilities, analogies, and standards, it is crucial to thoroughly examine the structure and effects of the Year 2000 bug itself. The Year 2000 bug, called "Y2K" for short, stems from the need in the early days of computers to conserve memory and reduce costs. Programmers wrote dates in two digits instead of four, and programmed the computers to assume that all dates were in the 1900s. They assumed that when memory and time were available, their programs would be replaced or rewritten with four digit dates in time for the turn of the century. Unfortunately, the problem persists in much software and many computer chips.[1] The year 2000 is problematic, because when the date rolls over from "99" to "00," a "non Year 2000 compliant" computer will assume the year is 1900, not 2000. If this problem is not fixed, it will result in unrealistic and incorrect calculations of birth dates, ages, billing dates and, due dates—virtually any calculation that requires dates. Further, it is likely that programs or products that do not even use dates in their output will be affected since many programs query the system clock (where the date problem will occur) for routine things, such as timing the use of an automobile's carburetor, or the usage time of an elevator.

Another part of the bug may cause problems in certain sectors that produce date sensitive data. The Year 2000 is a leap year, but the year 1900 was not; therefore, some systems will have difficulty with the extra day in February, and cause data to be corrupted. The problem may affect other businesses, if public utilities and public transportation systems do not correct for the leap year. Such a spinoff effect could be common with Y2K defects in software and hardware. If one contributor to a network miscalculates or shuts down because of the bug, the whole system may be corrupted or shut down. Hence, it is crucial for all businesses in data-intensive sectors to work together to ensure compatibility within their joint ventures. Phone companies are a good example of the need for coordinated, timely action: they all rely on hardware, software, and firmware that must all be compliant for the system to function properly.

A less prominent but potentially hazardous problem exists in the present use of "99." Not only is it used to represent the last year before the

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[1] See for e.g. "If It's 1/1/00 Then It must Be 1900!: What the Y2K Problem Is and Why It's Important." PC Novice 7:2 (Jan. 1999) 4 at 4.

rollover to 1999, but "99" has been used as a place holder in organizing computer code. Its function in some programs is to indicate that the data reference should never expire. However, if this is overlooked while the program is being fixed for the Year 2000 bug, the place holder may be inadvertently altered or simply miscalculated. Data that was meant to be held permanently would then be inaccessible or invalid.[2] Obviously, this result might shut down or invalidate programs that rely on that archived data.

II. Y2K and Its Impact on Business

Any of these Y2K problems may create business disruption. It is possible that businesses may shut down for weeks or months, as they struggle to manage computer systems in that the Year 2000 bug was ignored or poorly managed.[3] To avoid a shut down, businesses will need to spend large amounts of time, money, human and technical resources to get the programming problems fixed before the rollover to the year 2000. Even in this scenario, however, it is realistic to expect some minor delays and money losses as the instances of the bug are encountered and repaired.[4] In any case, many businesses in the manufacturing and service industries will face unhappy customers whose purchases, products, or services do not function properly. Businesses dealing in data may face users and shareholders who are frustrated at incorrect data, dropping stock prices, and inefficient or sloppy management of the Year 2000 bug. Unlike many litigious situations, the Year 2000 problem is a known problem with a clear solution. If a business acts in a timely manner, it can address the problem with the correct, technical solution, and avoid many or all of the disruptions and difficulties above.

As the year 2000 comes closer, the public is becoming increasingly inundated with information about Y2K and its possible effects. From 1997 to 1998, *The Globe and Mail* published dozens of articles on the

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[2] Canadian Institute of Chartered Accountants "Guidance for Directors – the Millennium Bug" online: <www.cica.cca/new/index.htm> (date accessed: March 7, 1998).

[3] E. Youdon & J. Youdon, *Time Bomb 2000: What the Computer Crisis Means to You* (Upper Saddle River: Prentice Hall, 1998) at 15–17.

[4] *Ibid.* at 15.

subject.[5] At the beginning of April, 1998, CBC Radio One aired three "Millennium bug" stories in one week, all focussing on government preparations for meeting its Year 2000 deadline, April 1, 1999.[6] The trouble is that the vast majority of companies, and consequently their directors, have not put their mind to the problem in a formal way. Besides anecdotal evidence of this ignorance or inaction, there has been proper statistical analysis of the situation. In February 1998, Statistics Canada released a report entitled "The Preparedness of Canadian Business for the Year 2000 Computer Problem."[7] The lack of preparedness is clear: Only 9% of Canadian businesses taken from a stratified sample of 2,000 businesses have tackled the issue through a formal plan. 36% are employing informal steps, 46% of businesses are aware of the problem but are not acting, and another 9% are not aware of the problem.[8]

As one might suspect, the businesses with the fewest resources—the businesses with fewer than fifty-one employees—are generally not aware of the problem and are doing little about it. These companies represent nearly all of the 9% of non-aware companies, and 51% of the aware but inactive companies.[9] Many medium-sized firms are at risk as well: both small and medium-sized businesses use and rely on miscellaneous office equipment, that is at risk of being affected by the bug.[10] Naturally, if the directors and officers of these companies do not take any action, the risk of harm to their businesses increases severely.

Action on dealing with Y2K also varies dramatically from sector to sector. Throughout the Statistics Canada results, it is clear that the finance, insurance, and manufacturing industries are the most active and prepared, while the trade sector and other services are the least active, and ill-prepared.[11] This may be partially related to the way these businesses use data and computers, but the results also show that nearly

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[5] The Globe and Mail Online < www.globeandmail.com> (date accessed: April 28, 1998).

[6] The Government Fiscal Year 2000 begins on this date; the government's informal deadline to begin testing their Year 2000 solutions was April 1, 1998.

[7] Statistics Canada (Small Businesses and Special Surveys Division), *The Preparedness of Canadian Business for the Year 2000 Computer Problem* (Ottawa: Statistics Canada, 1998).

[8] *Ibid.* at 3.

[9] *Supra* note 7 at 4.

[10] *Supra* note 7 at 4–6.

[11] *Supra* note 7 at 3–8.

every business relies on some miscellaneous office equipment.[12] Consequently, even though over 55% of Canadian firms are not taking action on the issue, nearly every Canadian firm is in a position to take steps to solve the problem. As will be shown in the legal analysis below, companies not acting will have to follow the lead set by firms taking formal steps. Ultimately, then, only 9% of the Canadian business population may be properly shielded from liability.

III. Directorial Duties

Directors and officers have reason to consider the legal problems arising from the year 2000. Shareholders who see their investments negatively affected by the company's performance after December 31, 1999 may find that their losses are due to the corporate treatment of the Year 2000 bug. Jeff Jinnett identifies four potential causes of actions in lawsuits against boards of directors and top management: (1) waste of corporate assets; (2) breach of fiduciary duty, duty of due care and/or duty of loyalty; (3) securities law violations; (4) breaches of duties under banking laws, pension laws, and similar laws."[13] Jinnett's list, while not exhaustive, illustrates the potential scope of Y2K litigation, although this paper focuses on the second action, particularly directorial duty of due care.

In Canada, Y2K suits are likely to proceed with Jinnett's second action, since directors owe a statutorily-entrenched fiduciary duty to the corporations that they serve. The ability of shareholders to litigate on behalf of the corporation is set out in the *CBCA*. The legislation allows the shareholders a distinct role, and an ability to sue a director(s) for breach of fiduciary duty on behalf of the corporation to which the duty is owed. Therefore, derivative actions are a useful starting point for considering Y2K litigation. As section 239 of the *CBCA* indicates,

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[12] *Supra* note 7 at 4–6.

[13] J. Jinnett, "Year 2000 'Millennium Bug' Litigation," LeBoeuf, Lamb, Greene & MacRae L.L.P., online: <www.llgm.FIRM/article5.htm> (date accessed: March 20, 1998). The limited scope of this article is sufficient only to cover the second of Jinnett's suggestions; the other potential areas of director concerns for Y2K are beyond the scope of this brief discussion.

shareholders who meet the definitions of "complainant" under the Act may sue a corporation directly:

> Subject to subsection (2), a complainant may apply to a court for leave to bring an action in the name and on behalf of a corporation or any of its subsidiaries, or intervene in an action to which any such body corporate is a party, for the purpose of prosecuting, defending or discontinuing the action on behalf of the body corporate.[14]

Subsection (2) of the section requires the complainant give adequate notice for actions under (1), act in good faith, and that the action appear to be in the interests of the corporation.[15]

The ability of shareholders to sue directors on behalf of the corporation for breaches of their fiduciary duty has created precedents surrounding directors' and officers' standard of care, diligence, and skill. First, in analyzing claims of breach of fiduciary duty by directors, it is important to state the parameters of the litigation. To begin with, the burden of proof lies on the plaintiff, as expressed in *Barnes* v. *Andrews* [hereinafter *Barnes*]: "[t]he plaintiff must accept the burden of showing that the performance of the [defendant director's] duties would have avoided loss, and what loss it would have avoided."[16] In meeting the onus, the plaintiff must prove that the director has failed the duty and standard of care required by statute and common law. Only then may the onus shift to the director, who must show they have met the standard of care, or perhaps invoke one of the defenses discussed below.

IV. Directorial Standard of Care

Jinnett's general prediction for suits against directors and officers offers a glimpse into the directorial standard of care and the due diligence standard discussed below:

> Some plaintiff's lawyers are likely to accuse a defendant company's directors and top management in front of the jury, of gross negligence and reckless disregard of their duty of care, explaining that even though the Year 2000 problem has been known for decades, the

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[14] *Canada Business Corporations Act*, R.S.C. 1985, C–44, s. 239(1) [hereinafter *CBCA*].
[15] *CBCA*, s. 239(2).
[16] 289 F. 614 (S.D. N.Y., 1924) at 616–17.

> company's directors and management waited until nearly the Year 2000 to begin actual corrective work, did not hold a single board of directors' meeting on the Year 2000 problem, and did not even approve a budget for the corrective work, expecting the company's Information Systems (IS) staff to do all of the work out of its existing maintenance budget, inevitably leading to a failure of the company's Year 2000 corrective plan.[17]

Breach of fiduciary duty is covered by the *CBCA*, and further articulated and defined in American and Canadian case law.

Specifically, since breach of fiduciary duty is a tort of negligence, case law has developed a distinct standard of care that directors must clearly meet. The leading decision on this subject is a 1925 English case, *Re City Equitable Fire Insurance Company Limited.*[18] Despite its age, the case is consistently followed and re-affirmed by contemporary Canadian and American courts including the Supreme Court of Canada.[19] *Re City Equitable* outlines the limitations of any objective tests for directors facing breach of fiduciary claims:

> In order, therefore to ascertain the duties that a person appointed to the board of an established company undertakes to perform, it is necessary to consider not only the nature of the company's business, but also the manner in which the work of the company is in fact distributed between the directors and other officials of the company.[20]

This contextualized view of standard of care has been reiterated by the British Columbia Supreme Court. In *Grindrod & District Credit Union* v. *Cumis Insurance Society, Inc.,*[21] Dohm, J. follows *Re City Equitable*, and finds the appropriate standard to be "the care, diligence and skill of reasonably prudent persons."[22]

However, given our statutory framework, Canadian businesses must meet a stricter duty of care. As Dickerson, Howard, and Getz emphasized in their 1971 proposals, "the formulation of the duty of care, diligence and skill owed by directors represents an attempt to upgrade

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[17] *Supra* note 13.

[18] (1924) [1925] 1 Ch. 407, at 427 [hereinafter *Re City Equitable*].

[19] See for e.g. *Blair* v. *Consolidated Enfield Corp.* (1995), 128 D.L.R. (4th) 73 (S.C.C.); *Soper* v. *R.* (1997) 149 D.L.R. (4th) 297 (Fed.C.A.).

[20] *Supra* note 18 at 427.

[21] (1983), 4 C.C.L.I. 47 (B.C.S.C.)

[22] *Ibid.* at 60.

the standard presently required of them."[23] The *CBCA* codifies a more objective duty of care required of directors and officers:

> s. 122 (1) Duty of care of directors and officers Every director and officer of a corporation in exercising his powers and discharging his duties shall
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> (a) act honestly and in good faith with a view to the best interests of the corporation; and
>
> (b) exercise the care, diligence and skill that a reasonably prudent person would exercise in comparable circumstances.[24]

The standard is strengthened by the fact that directors and officers cannot treat this duty as optional; *CBCA*, section 122(2) states clearly that they have statutory duty to comply with "the Act, the regulations, articles, by-laws and any unanimous shareholder agreement."[25] Therefore, the standard is one of mandatory, not voluntary, compliance.

The case law interpreting the standard emphasizes corporate awareness, a component of the statutory "care, diligence and skill" requirement that will likely play a large role in Year 2000 litigation. As the Tax Court of Canada elucidates in *Merson*, "[a] director has an obligation to be aware of what is happening within the corporation of which he is a director. Effective lines of communication between him and the corporation's responsible employees must be present to ensure the director does not fail his statutory obligations."[26] This communication will prove to be critical in the Y2K situation, since all parts of the corporation must be aware of Y2K and a clear system for fixing, implementing solutions and controlling the bug must be established throughout the corporation. Therefore, this part of the directors's standard is one to which directors and their counsel ought to pay particular attention. Failing this provision alone may result in the failure of the rest of the Year 2000 strategy. Unlike some financial or pure business decisions required of directors, proper treatment of the problem will require the directors to extend the decision beyond the boardroom. Cooperation across the corporate structure will certainly

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[23] R.M.V. Dickerson, J.L. Howard & L. Getz, *Proposals for a new Business Corporations Law for Canada* (Ottawa: Information Canada, 1971).

[24] *CBCA*, s. 122(1).

[25] *CBCA*, s. 122(2).

[26] [1989] 1 C.T.C. 2074 (T.C.C.) at 2084.

require directors live up to this statutory and common law duty of communication.

The *CBCA* also allows suits for breaches of honesty and good faith.[27] Yet, given the highly technical nature of the problem and the straightforward solutions available, it is unlikely that the bug will create honesty or good faith dilemmas for directors. This puts the Year 2000 directors's litigation in a unique position. As J.W. Bishop states, in reference to director's liability suits more generally, "[t]he search for cases in which directors of industrial corporations have been held liable in derivative suits for negligence uncomplicated by self-dealing is a search for a very small number of needles in a very large haystack."[28] Simply put, the Y2K issue question demands timely legal analysis and attention partly because it has few parallels in directors liability precedents.

Most actions will focus solely on subsection (b). In requiring the care, diligence and skill of a reasonably prudent person, the language was intended to upgrade the standard expected of directors and officers. Applying this to Y2K, it is clear that directors and officers cannot simply say they do not understand computers, or they are not capable of re-programming them, and escape liability for the technical problem and its effects on business. Rather, the statute indicates that there will be an objective standard, based on the reasonably prudent person. The Year 2000 bug is an obvious problem, and is well known to be at least a minor hazard, even if the technical intricacies are not fully understood. There is an obvious, clear solution available. Directors can design and implement a system to deal with the problem. As discussed in the final sections of this paper, a reasonably prudent person would be aware of the solution, if they turned their mind to the problem. The decision to act or to ignore the problem is clearly a business decision, within the jurisdiction of the directors and officers of the corporation.

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[27] *CBCA*, s. 122(1)(a).

[28] J.W. Bishop, "Sitting Ducks and Decoy Ducks: New Trends in Indemnification of Corporate Directors and Officers" (1968) Yale L.J. 1078 at 1099.

V. Defenses: Common Law and Statutory Protections

The outcome of Y2K litigation may rely on how successful directors are in using various common law and statutory defenses. By the nature of the issue, defenses will require innovation on the part of the director in making the standard directors liability defense arguments persuasive, and on the part of the judiciary in interpreting the current directors liability legal framework to accept the defenses in this unique circumstance. Although a number of defenses may be available,[29] this analysis focuses on directors use of the U.S. business judgment rule, reliance on experts' reports, and the defense of due diligence currently used in strict liability cases.

1. Canadian Use of The U.S. Business Judgment Rule

Courts in the past have been reluctant to find directors liable for breaches of duty or care; this is partly due to the heavy burden placed on the plaintiff.[30] The courts's reluctance is also due to their deference to the corporate structure—particularly the directors role within the corporate framework. In an analysis of the court's deference to directors, John Howard compares the standard expected of bureaucrats and that expected of their corporate counterparts, the directors:

> Stated in blunter terms, the bureaucrat's function is carried out in a structure designed to separate tasks, diffuse responsibility and implement restraints to minimize risks. The director's function is the converse. It is to decide among alternative business risks for the benefit of the corporation and its shareholders, applying the collective knowledge experience and intuition of a collegiate board.[31]

Howard asserts that the courts use the traditional role of the individual corporate director to justify her or his inability to intervene in decisions of the collective, corporate board. Essentially, the court finds the role of

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[29] Jinnett lists a number of potential defenses, including the defense of industry standard practice claim being barred by a statute of limitations, use of a due diligence defense, and the business judgment rule. The latter two are discussed in this paper. For further details, see Jinnett, *supra* note 13.

[30] *Supra* note 16 at 616–17.

[31] J. Howard, "Takeover Battles and the Business Judgment Rule: Recent American Case Law Development" (1986) 11 Can Bus L.J. 445 at 447–48.

"corporate cop" a difficult one, and prefers not to second guess the decisions of corporate boards. This view is supported by the Delaware Supreme Court. In *Smith* v. *Van Gorkom*,[32] a leading U.S. directors' and officers' liability case, Horsely, J articulates the rationale for the court's approach: "The Business Judgment Rule exists to protect and promote the full and free exercise of the managerial power granted to . . . directors."[33]

The court's deference to directors and boards in making corporate decisions has evolved into an informal defense to actions against directors, termed the "business judgment rule": "the business judgment rule means that a court will not, with the benefit of hindsight, impugn a director's decision that was based on the director's informed and reasoned business judgment and not vitiated by any conflict of interest or of duty to a third party."[34] In the absence of failing to meet fiduciary duty, a director may then rely on some discretion from the courts, provided that they have investigated the situation, listened to experts when necessary and then made a "reasoned and informed decision."[35] Once again the concept of awareness is key; directors must make themselves aware of the problem, possible solutions, and the consequences of their actions.

The parameters of the business judgment rule fit the Year 2000 context very well: there is a specific computer problem of which any reasonable director will be aware by now, there are computer experts readily available for consultation, and a plethora of resources on the Internet alone to guide them to a reasoned and informed decision. Unlike many other directors and officers liability issues, this problem is well documented and has a definable solution—re-programming computer systems, software, hardware, and firmware, and contacting other companies for assurances of the same on third party products.

The business judgment rule has become a mainstay in the U.S. courts, but its use in Canada is questionable. Despite the rule's foundation in the traditional role of the director and its reliance on reasonableness, it is unlikely that the rule will be accepted outright in

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[32] 488 A.2d 858 (1985, Del. S.C.).

[33] *Ibid*. at 872.

[34] *Supra* note 31 at 446.

Canadian directors and officers liability suits. British Columbia's Supreme Court has shown disdain towards the concept, stating that "the leniency of the English law towards the conduct and responsibilities of company directors is a much outdated model."[36] However, Year 2000 litigation may be the perfect opportunity for Canadian courts to apply the rule, even if they are reluctant to label the defense as such. In the Year 2000 context it is reasonable to assume that directors may use the rule as a defense from liability if they are able to show that their decisions were based on reasoned and informed business judgment. Directors must act—and prudently—in order to use the business judgment rule effectively. It is seems unlikely that omissions would be shielded by the rule.

2. Reliance on Experts

Because of the structure of Canada's directors and officers liability laws, Canadian directors may also use the reliance portion of the business judgment rule independently, without invoking the rule per se. Section 123(4) of the *CBCA* allows for directors' reliance on statements:

> A director is not liable under section 118, 119, or 122 if he relies in good faith on
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> (a) financial statements of the corporation represented to him by an officer of the corporation or in a written report of the auditor of the corporation fairly to reflect the financial condition of the corporation; or
>
> (b) a report of a lawyer, accountant, engineer, appraiser or other person whose profession lends credibility to a statement made by him.[37]

Part (a) will likely not be invoked since the directors and officers decisions being challenged are not primarily financial, although the overall financial condition of the corporation may well be implicated in the other decisions being challenged. It is most likely that directors will attempt to invoke part (b) of this section as their defense given the technical nature of the problem. This defense may appear to be an easy, straightforward option, but there

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[35] *Ibid.* at 450.

[36] *Dixon* v. *Deacon Morgan McEwen Easson* (1989), 41 B.C.L.R. (2d) 180 (S.C.) at 195.

are some major limitations on its use. One of these limitations is directed towards the use of the expert's report. Namely, a director cannot simply receive an expert's report and expect to escape liability simply by citing section 123(4). As emphasized by the Alberta Supreme Court Trial Division in *Northern & Central Gas*, "When outsider advice . . . is obtained the directors of a company are entitled to rely on that advice if it is given by a person appearing to be qualified, but on receipt of such advice, *the directors must themselves exercise their judgment.*"[38] The defense requires directors to act, and take responsibility for their decisions.

Further limitations are made regarding the position and knowledge of the expert. From a business point of view, expert reports will only by useful to make decisions if they are complete, and written by a well-informed specialist in the field. This holds true from a legal point of view, in that expert reports will only be useful in invoking a section 123(4) defense if they are similarly written. The Court of Queen's Bench in Alberta has clearly stated that directors cannot rely on this defense where the expert is not properly apprised of all relevant facts.[39] Again, the rule puts responsibility into the hands of the director, who must choose the expert with care, and ensures that the expert is given the correct and full facts. This limitation may make the "expert reports" defense difficult to use in the Year 2000 context. Although the technical problem is fairly easy to assess, and the facts behind the faulty roll-overs, unexpected leap year, and even the place holder problem are easily discoverable, experts will likely need to advise on the impacts of the technical problem. Those impacts are not well known at this point, and gathering all the relevant facts for each area may prove impractical. As discussed above, the impacts of the Y2K bug are expected to be complex, and cover many fields. If directors cannot be assured that their experts are even able to gather all of the relevant facts, then they may be wary of legally relying on the expert reports in court.

Furthermore, there may be a limitation on the use of reports from information systems managers and other company technicians.

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[37] *CBCA*, s. 123(4).

[38] C.M. Schmitthoff & J.H. Thomson, *Palmer's Company Law* (London: Stevens & Sons Limited, 1968) as cited by Lieberman J. in *Northern & Central Gas Corp.* v. *Hillcrest Collieries Ltd.* [1976] 59 D.L.R. (3d) 533 at 597–98 [emphasis in original].

[39] *Westfair Foods Ltd.* v. *Watt* (1990), 73 Alta L.R. (2d) 326 at 349–50, aff'd (1991) 79 Alta. L.R. (2d) 363 (C.A.).

Although these people will certainly be among the hosts of experts consulted by directors, they may not fit the section 123(4)(b) requirement that experts be in a "profession which lends credibility to a statement made by him [or her]."[40] Unlike the other experts enumerated in the subsection, information systems managers and computer programmers are not professionals in the traditional sense of belonging to a self-governing body that is recognized by the courts. Information system managers and programmers are not typically given the same status as experts whose professional relationships are based on fiduciary principles or even matters of trust and confidentiality. Shareholders would be likely to push this issue if a director invoked section 123(4) for reliance on a programmer's "expert report," underscoring the role of the experts as "mere technicians," not legally recognized professionals. Given the courts' unfamiliarity with the field, and lack of a "profession" to give the expert inherent credibility, the courts may cede to the shareholders on this point, weakening the defense further.

Well-informed defense lawyers, however, may be able to persuade the court that, in specific cases, software programmers are "engineers," and are treated as such in their education (often through faculties of engineering), by their pay scales, and by their responsibilities in the workplace. This is an area that requires clarification in Canadian corporate law, as corporations increase their use of and reliance on computers, computer networks, information systems and "technology" generally.

Section 123 of the *CBCA* appears to offer another possible avenue of defense, a dissent from "any resolution passed or action taken thereat."[41] A director who disagrees with a particular action or decision of the board, and follows the procedures for dissenting as laid out in the section, would presumably escape liability for the board's action. However, this defense has two limitations: one inherent, and one particular to the Year 2000 situation. The inherent limitation is one of procedure. Dissent may only work as a defense if the director actively dissents from the resolution or motion. Thus, to use the defense, directors must vote against resolutions permitting the action, and the

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[40] This requirement of relying on a person of a "profession" has been affirmed by the Supreme Court of Canada. See for e.g. *Blair* v. *Consolidated Enfield Corp. supra* note 19.

[41] *CBCA*, s. 123(1).

acts in question must be among those covered at sections 118, 119, or 122 of the Act.[42] The types of claims expected in Y2K litigation do not specify liability only where the director consented, although this may be implied in the onus on the plaintiff to prove that the director acted to cause the loss. The second limitation, specific to the Y2K context, is the reality that boards of directors will not pass motions resolving to do nothing about the bug, or not to meet the industry and legal standard for reducing and managing the problem, risks, and impact of the bug. The behaviour challenged by the shareholders will presumably be inaction and insufficient action by the directors towards the problem. This would not attract the conditions precedent for a director to dissent from the acts or decisions.

3. Due Diligence: Legal Analogies and Y2K

Perhaps the most cogent defense will be that of due diligence. The straightforward nature of the problem may make the definition of the due diligence standard relatively easy, despite the lack of direct precedents. Unlike many other actions against corporations where there are discrepancies about the nature of the business decision and whether it indeed requires some action, this problem is recognizable with a clear solution. The Y2K problem for directors may be analyzed through legal analogy with the environmental due diligence cases, and computer virus situations. Although these cases relate to specific statutory offences, and there are no comparable Y2K statutory offenses in Canada at this time, the environmental and computer virus case law ought to give directors and officers some indication of the standard of diligence and skill expected in the Y2K context.

The environmental cases are appropriate for analogy to the Y2K situation because these cases involve directors making decisions over areas in which they do not have technical expertise. Just as a C.E.O. of a major manufacturing company is not likely to understand the technicalities of the dumping processes of the company's mills, most directors are not likely to understand the technicalities or the full potential impact of the Year 2000 problem. Yet, the standards required of both of these directors demand that they take responsibilities for

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[42] *CBCA*, s. 118 – Directors' liability; s. 119 – Liability of directors for wages; s. 122 – Duty of care of directors and officers.

decisions outside their expertise. Although environmental cases tend to be prosecuted under environmental laws, the standard required is strikingly similar to the *CBCA* provisions discussed above: the directors must meet a standard of due diligence.[43]

There are two key environmental cases in Canadian law to which Year 2000 litigators may look for guidance on due diligence: *R* v. *City of Sault Ste. Marie,*[44] and *R.* v. *Bata.*[45] *Sault Ste. Marie* defines three categories of offences, including one of strict liability that requires a defense of due diligence. *Bata* poses fundamental questions that must be addressed in reviewing directors' defense of due diligence. In *Sault Ste. Marie*, the court clearly defines strict liability offences as, "[o]ffences in which there is no necessity for the prosecution to prove the existence of mens rea; the doing of the prohibited act prima facie imports the offense."[46] Further, the decision enunciates a clear definition of the due diligence standard: the strict liability offense leaves "it open to the accused to avoid liability by proving he took all reasonable care. This involves consideration of what a reasonable man would have done in the circumstances."[47] This reasonable test appears similar to the test in *Re City Equitable*, but is a more objective test. In *Re City Equitable* the standard was a reasonable man with the experience and circumstances of the director in question. In *Sault Ste. Marie*, the due diligence standard is based on what the reasonable director would do, without specifying it must be a reasonable person of the same experience and/or circumstances.

Sault Ste. Marie informs Year 2000 litigators of the need to ensure their clients can prove their actions were those of a reasonable person, regardless of their experience. *Sault Ste. Marie* also offers a clear definition of when the due diligence defense is operable: "[t]he defense will be available if the accused reasonably believed in a mistaken set of facts which, if true, would render the act or omission innocent, or he

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[43] See *Bata*, *infra* note 45, where directors were under a statutory duty not to dispose of materials contrary to the Act and regulations.

[44] [1978] 2 S.C.R. 1299 [hereinafter *Sault Ste. Marie*].

[45] (1992), 9 O.R. (3d) 330 (Ont. Ct. (Prov. Div.)). This case was appealed to the Ontario Court of Appeal, but the appeal judgment did not deal with the due diligence standard. [hereinafter *Bata*].

[46] *Supra* note 44 at 1326.

[47] *Ibid.*

took all reasonable steps to avoid the particular event."[48] These limitations on the applicability of the due diligence standard will likely be applied in the Year 2000 situation. The use of mistaken facts may be applied when a director has been informed by someone else of the problem that requires a decision, and the possible choices. As in the environmental cases, the Year 2000 situation demands a wider knowledge of the technicalities than a director is likely to possess. It is likely that a director will ask for assistance from an expert in the field, such as a manager of Information Systems within the corporation.[49] Some smaller or less technically inclined corporations may need to look outside their businesses for assistance.

To use this mistaken facts portion of the defense, directors will need to prove that the information they received was actually "mistaken." Reliance on mistaken facts is a reasonable scenario in the Y2K context because of the obvious limitations on a director's ability to fully comprehend the technicalities of the problem and, more importantly, all of the aspects of the solution. Proving these facts were mistaken will vary depending on the circumstances of each case. It is reasonable to predict that a report that makes sweeping generalizations about the problem's potential solutions will not be reasonable to rely on. Unfortunately, given the relatively low levels of awareness and preparedness in small and medium sized Canadian companies, reliance on such simplistic generalizations may be a reality. Rather, for the defense to be used, the facts must appear reasonable to the director, and be directed specifically at answering the director's concerns and gaps in knowledge surrounding the problem. This issue is further analyzed below, since this portion of due diligence overlaps with the statutory defense of reliance on experts' reports, through section 123(4) of the *CBCA*.[50]

The defence of "taking reasonable steps to avoid the particular event"[51] is more likely to be met in the year 2000 context. Just as environmental hazards require highly technical, highly complex solutions, so does the Y2K problem, particularly in large corporations.

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[48] *Ibid.*

[49] W.S. Reid, "2001: A Legal Odyssey" online: <www.year2000/archive/legal.htm> (date accessed: July 26, 1997).

[50] *CBCA*, s. 123(4)(b).

[51] *Supra* note 44 at 1326.

A system must be put into place by directors, even if they do not have the technical knowledge to implement it. It is also predictable that both parts of the defense will be used by directors when establishing they have met their duty of due diligence. In order for directors to devise and implement complex, company wide solutions that include major decisions to be made in the information systems, human resources, finance, and legal departments, directors will likely need to consult and rely on experts to explain the problem and devise a workable, legally defensible system.

The *Bata* decision expands on this requirement in environmental cases for having "comprehensive and effective environmental management systems to identify, manage, and control the risk of harm to the environment."[52] In *Bata*, Ormston J. accepted a leading U.S. case *Michigan Natural Resources Commission* v. *Arco Industries* [53] as it was discussed in a Canadian legal text by Dianne Saxe.[54] The court in *Bata* puts emphasis on three interrelated points from *Arco*: (i) the balance of corporate responsibility in general and specific responsibilities for health and safety; (ii) the role and ability of an individual (director); and (iii) a discussion of corporate and societal responsibility.

First, it is underscored that "a court under the circumstances [*Arco*] should weigh the factors of the corporate individual's degree of authority in general and specific responsibility for health and safety practices, including hazardous waste disposal."[55] This standard is to be applied in answering the question whether the individual could have prevented the harm. In turn, this perspective reinforces the view expressed earlier in *Barnes*, that the plaintiff must prove that the individual respondent could have prevented the harm.[56] In Y2K cases, the very nature of the problem (inability to deal with the inevitable date rollover) makes the standard seem patently obvious—the date rollover to the Year 2000 was going to come, and it is a well known problem within the field of computer software, hardware, and manufacturing.

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[52] Weir Foulds, Toronto "Environmental Law" online: <www.weirfoulds.com/business/bus13.html> (date accessed: March 27, 1998).

[53] W.L. 125, 750 (W.D. Mich, 1989) [hereinafter *Arco*].

[54] D. Saxe, *Environmental Offenses: Corporate Responsibility and Executive Liability* (Aurora: Canada Law Book, 1990).

[55] *Ibid.* at 121.

[56] *Supra* note 16

Secondly, *Arco* instructs on the evidentiary requirements of directors' liability defenses:

> This court will look at evidence of an individual's authority to control, among other things, waste handling practices—evidence such as whether the individual holds the position of officer or director, especially where there is a co-existing management position; distribution of wealth within the corporation, including the position in the corporate hierarchy and percentage of shares owned. Weighed along with the power factors will be evidence of responsibility undertaken for waste disposal practices, including *evidence of responsibility undertaken and neglected, as well as affirmative attempts to prevent unlawful waste disposal.* [emphasis added][57]

Waste management would be an on-going responsibility for an officer or director, whereas the Y2K problem is only a one-time event. This focus on the individual's ability to control the waste management practices may be useful in Y2K liability cases, since the duties required of the directors are similar. Complications and losses due to Y2K can clearly be mitigated if a director undertakes his or her responsibility. Just as directors are expected to prevent unlawful harm to the physical environment in environmental cases, in the Y2K litigation context directors are expected to prevent harm to the corporate environment. Although directors do not face statutory offences in the Y2K context, they do face the possibility of private litigation. Directors in both cases are obligated to follow the law, be it statutory or common law. It is highly appropriate then, for Canadian courts to adopt these evidentiary requirements in Y2K litigation in the same way that *Bata* reinforced them for environmental cases.

Lastly, *Arco* as cited in *Bata* emphasizes the social and corporate position of the director, which is "implicitly undertaken by the acquisition of increased power or authority within the corporation and responsibility explicitly undertaken by job description or agreement."[58] This increased responsibility under job requirements or contractual agreement is not unique to corporations engaged in environmental litigation. Rather, corporate responsibilities have a double resonance in Y2K litigation. In the normal course of corporate business, the potential for taking a cheaper and possibly less reasonable or responsible

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[57] *Supra* note 54 at 121.

approach increases as one's financial stake in the corporation grows. Second, the impetus to act is fueled by the fact that the business may suffer or fail if a Y2K "breach" is committed. This is in contrast with many environmental offenses, such as in *Bata*. In environmental situations, there is often a cheap alternative that does not harm the company, unless it is caught for the infraction. Therefore, recognizing the corporate and social responsibility of a corporation's decision makers is doubly important. Without appropriate directorial action on the issue, both the reputation and the fiscal health of the corporation are jeopardized.

Applying these statements from the *Arco* decision, the *Bata* decision offers specific guidance to establishing the standard required of directors in the form of a "useful checklist."[59] Ormston J. outlines the essential criteria:

> I ask myself the following questions in assessing the defense of due diligence:
>
> (a) Did the board of directors establish a pollution prevention "system" as indicated in *R* v. *Ste Sault Marie i.e.*, was there supervision or inspection? Was there improvement in business methods? Did he exhort those he controlled or influenced?
>
> (b) Did each director ensure that the corporate officers have been instructed to set up a system sufficient within the terms and practices of its industry of ensuring compliance with environmental laws, to ensure that the officers report back periodically to the board on the operation of the system, and to ensure that the officers are instructed to report any substantial non-compliance to the board in the timely manner?
>
> I reminded myself that:
>
> (c) The directors are responsible for reviewing the environmental compliance reports provided by the officers of the corporation, but are justified in placing *reasonable* reliance on reports provided to them by corporate officers, consultants, counsel or other informed parties.

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[58] *Ibid.*

[59] Environment Canada Atlantic region, "Notes on Possible Due Diligence Defense" online: <www. Ns.ec.gc.ca/enforcement/due_diligence.html> (date accessed: March 27, 1998).

(d) The directors should substantiate that the officers are promptly addressing environmental concerns brought to their attention by government agencies or other concerned parties including shareholders.

(e) The directors should be aware of the standards of the industry and other industries which deal with similar environmental pollutants or risks.

(f) The directors should immediately and personally react when they have notice the system has failed. [emphasis in original][60]

In addition to this general framework, the court states that "one would hope to find remedial and contingency plans for spills, a system of ongoing environmental audit, training programs, sufficient authority to act and other indices of a proactive environmental policy."[61] There is a clear emphasis on the need for a structured, systematic approach to preventing, controlling, and mitigating error. In short, the director(s) must formulate a plan and follow it responsibly.

To apply the above framework to the Y2K situation, judges will require better knowledge of the situation. One of the above problems is that while directors must follow written environmental laws and regulations—and these are easily available for analysis and interpretation by the judge or other trier of fact—there are no similar written laws or regulations laid down for Y2K. As described earlier, there are both statutory and common law requirements of directors, but these do not include minimum standards as environmental laws or regulations might. For instance, in the environmental context, companies have limits on the amounts of waste dumped. In the absence of specific guidance on the minimum levels of action or prevention required, directors and judges alike will need to apply these due diligence questions and principles on a case by case basis. Until the first few cases are litigated, there will be no common law standard for action.

4. Computer Viruses

Due diligence has also been cited as an applicable defense in another area of computer law: liability for computer viruses. At first glance, computer virus cases may not appear appropriate for use in Y2K

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[60] *Supra* note 45 at 362–63.
[61] *Ibid.* at 363.

analysis, since computer virus cases are typically product liability cases. Typical Y2K cases may not deal with product liability, but rather consider the end result of the faults in the computerized systems over which the directors have control. Product liability may be a factor in Y2K directors' and officers' suits, where the corporation in question deals in computer software, hardware, or computerized equipment. Still, the computer virus analogy to Y2K is applicable, since the outcomes and affects may be the same for both these computer problems.

A computer virus can be defined as:

> a program which in some manner, assumes control of a portion of the computer without the rightful user's consent, often to a destructive end. In computer science terms, a software virus is a program which is dedicated to assuming control of some part of the computer without the rightful operator's consent and which can replicate and spread from one machine to another through apparently harmless contact.[62]

Taking this non-technical definition, the comparison with the Year 2000 context is clear: while the computer is still controlled by its rightful owner in the Year 2000 problem, the effects may be greatly destructive to a company's data and operations. The comparison with the more technical computer science definition is illustrative of the problem Y2K may create on a network: although the Year 2000 bug need not travel from one computer to the other, the result on the network would be the same, the systemic shut down of operations, corruption of data, and incapacity of computers to work beyond the key rollover and transition dates if the problem is not fixed.

These similarities in the effects of computer viruses and the Y2K problem lead to similarities in the way liability for these problems will be treated by corporations and courts alike. A lack of direct precedents for Y2K litigation will lead lawyers and courts to draw analogies, such as those to environmental due diligence and computer virus cases. In Australia, one group risk manager at a public utility has applied due diligence standards as established in the environmental cases, to other parts of the corporation: "A lot of people looked at due diligence from an environmental point of view . . . . Certainly, we did . . . because of our popular by-products. But there are so many other things an organization

[62] R.D. Desilets, Jr., "Software Exposure to Products Liability for Computer Viruses" (1988–89) 9 Computer/ L.J. 509 at 511.

can do [in] a due diligence program, so their directors can be sure that things are being handled properly."[63] The standard expected for computer viruses, the Australian executive maintains, is due diligence as it is for environmental cases, because "viruses are an obvious threat to business, particularly in the private sector where computer records are linked directly to sales and survival."[64]

Using due diligence in computer cases is not a new thought. In fact, the applicability of strict liability with the defense of due diligence in computer cases has been considered since the early 1980s. In his 1983 *Computer Law Journal* article, David Hall lays out the reasons for considering strict liability for computer cases:

> First, the party in the best position to detect and eliminate defects should be responsible for damages inflicted by defective products. Second, liability should be placed upon the party best able to absorb and spread the risk or cost of injuries through insurance. Third, a remedy should not be prevented by burdensome requirements of proof, since an injured person is not normally in a position to identify the cause of the defect. Fourth, due to modern marketing methods, computers rely on the reputation of a manufacturer and no longer adhere to the doctrine of caveat emptor.[65]

This four point analysis has been directly applied to the use of strict liability computer virus cases, in a 1989 article in the same journal, entitled "Software Vendor's Exposure to Products Liability for Computer Viruses."[66] The author enumerates major policy reasons for imposing strict liability in computer virus situations:

> It makes more sense for the originator of a program, who possesses both the expertise and the human readable form of a program, to look for defects, such as computer viruses. It also makes sense to place the burden on the software originator to show that the software is free from the type of defect that would cause the injury claimed.[67]

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[63] Bruce Ferguson, Sydney Water Corporation, as quoted in K. Dolan, "The Risks of Tomorrow" online: <www.phoenixmags.com.au/cr.jan96/futurer.htm> (date accessed: March 27, 1998)

[64] *Ibid.*

[65] D. A. Hall, "Strict Liability and Computer Software: Caveat Vendor" (1983) 4 Computer/L.J. 373 at 375.

[66] *Supra* note 62.

[67] *Ibid.* at 524.

Making strict liability an option in computer virus litigation makes due diligence a defense by extension. In light of the general and technical similarities between computer viruses and the Year 2000 bug, it also makes sense to apply, by analogy, due diligence standards to Year 2000 liability cases. The end user is harmed, damages are created by the misuse, poor development, or mismanagement of the technology, and the corporation is in a position to prevent or mitigate these damages. Similarly, litigation in the Y2K context will ensue if the corporation's directors do not act, just as corporations are sued for similar misguided acts or omissions in computer software and hardware development.

In summary, the due diligence defense is both the most promising defense and the easiest to employ. As Warren Reid states in his article on the legal fallout from the Y2K bug, in addressing directors and officers on the issue of Y2K, "[i]t turns out that the same tasks you need to perform to defend yourself are also the same ones you need to solve the Year 2000 problem for your organisation. So, in this sense, doing the right thing, in fact will work for your systems, for your organisation, as well as in court!"[68] Meeting the due diligence standard makes good legal sense and good business sense.

5. Due Diligence in the Year 2000 Context

Once the applicability of the due diligence defense is established, the director must present evidence of what this standard is, and subsequently prove that they have lived up to the due diligence standard. In considering the standard for due diligence, the court ought to recognize that the standard will be a subjective one. The subjective element will depend on the position of the director or officer in question, the corporate structure, the extent, impact, and effects of the Year 2000 bug in that industry, and the specific corporate entity. Simply put, a small retail firm ought not be held up to the same due diligence standard as a national banking institution, since the requirements, needs, and expectations in the industry are markedly different.

Applying the general due diligence standard to the specific technical, legal, and business circumstances of the Year 2000 bug, there is a general consensus that directors and officers must actually

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[68] *Supra* note 49.

formulate, implement, and follow up on a formal, multi-department solution. Like environmental cases, the Year 2000 bug cases will require directors and officers to implement a system of care and control, to avoid and manage the damage caused by the problem. Although most experts agree on the necessary components of the solution, they often express the steps differently. The "core" activities for the "system of care and control" are enumerated by the Canadian Institute of Chartered Accountants (CICA): having a project team in place, making an organization-wide impact assessment, developing a plan, taking action, monitoring progress, updating the plan and reporting, and developing contingency plans.[69] The CICA is only one of dozens of organizations and associations that is providing information to its members on this subject. From the sheer volume of material that has been available to directors since 1997, it would be hard to say that directors have not had access to information about how to formulate a "Y2K plan."

Other authors have been more specific in outlining the requirements of due diligence for the courtroom and the corporation's bottom line. In his article on the legal fallout from the Y2K bug, Warren Reid identifies nine steps that are indicative of the specific standards courts are likely to look for:

> [e]stablishing a steering committee to plan and oversee the Year 2000 compliance project; inventory of software (and hardware); risk assessment and statement of impact; communication across all levels of the organisation; a detailed plan to fix the problem; producing a budget and critical path analysis; documentation to show that the plan was followed , and completed; status reports regarding the work plan, work completed, problems that arose and solutions implemented, and follow up; and finally documents to show that alternatives were considered.[70]

This comprehensive list of steps and required documentation should be a sufficient guide from the director's perspective.

There are additional acts that corporate counsel would be wise to perform if corporate counsel is also the director in question. Counsel should ensure all licenses and agreements have been audited, review all corporate and directors-and-officers insurance policies in light of the

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[69] *Supra* note 2.
[70] *Supra* note 49.

Year 2000 bug, and identify all parties who the corporation may sue or be sued by.[71] These steps are particularly crucial for directors who are also corporate counsel for the entity being sued. It is likely that corporate counsel will face a higher standard of care and thus stricter expectations for their due diligence defense due to their position and professional status within the corporation.

VI. Conclusion and Possible Outcomes

Given the technical problem, risks, and lack of corporate awareness in Canada of Y2K and its possible effects, it is likely that shareholders will be in a position to sue under the *CBCA*. Section 239 allows for shareholders to sue on behalf of the corporation, and the predictable and controllable nature of the problem makes the situation ripe for suits to be filed as soon as losses may be determined. Yet, it is unlikely the courts will be flooded with suits immediately. The losses, mismanagement, and evidence of breaches of fiduciary duty may not appear until weeks or months into the year 2000. Therefore, the suits are likely to be filed throughout the limitation periods available for the different breaches.

Moreover, legislative action may help close the floodgates. The Senate Standing Committee on Banking, Trade and Commerce considered directors' liability in their review of the *CBCA*, and made a number of recommendations. The committee suggested that the federal government "strongly consider incorporating by reference into the *CBCA* provincial laws that overlap with provision of the *CBCA*."[72] This would allow for predictability and reduce conflict between the jurisdictions, and would be particularly helpful in establishing the statutory parameters for the law suits and the possible defenses. The Committee also turned their attention to the specific problem of due diligence, concluding that due diligence be codified as a defense for a

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[71] For details see M. Stuhlmiller, "Can you hear the lawyers singing 'We're gonna party like it's 1999'?: The Fiduciary Duty of Officers and Directors to Become Year 2000 Compliant" online: <www.year2000.com/archive/lawparty.html> (date accessed: June 20, 1997).

[72] The Standing Committee on banking Trade and Commerce, "Corporate Governance" online: <www.parl.gc.ca/english/senate/com-e/bank-e/rep-e/cgo-e.html> (date accessed: March 7, 1998).

number of offenses under the *CBCA*, including section 122 breaches of duty, under which Y2K litigation is most likely to fall. Throughout their directors' liability proposals, the Committee seeks to expand the scope of due diligence as a defense, stating that all federal laws that impose liability on directors ought to be amended to include a codified due diligence defense. Should the recommendations of the committee be embraced by Parliament, directors, and officers of Canadian corporations would stand a much better chance at launching effective, full defenses to Y2K litigation, since their best defense will be available by right. Naturally, corporations will still need to meet the due diligence standard, and doing so will still be good for business and for their legal position.

Although Parliament has not produced legislation specifically aimed at Y2K bug and subsequent litigation, it could follow the lead being set by a number of American states. Some jurisdictions have introduced, and in some cases already passed, legislation to prevent Y2K litigation against government, agencies and public departments, while other states have extended limits on litigation between private parties as well.[73] California Bill AB 1710, submitted by California State Assemblyman Brooks Firestone, is directed at limiting the damages that can be claimed and the monetary amounts awarded. The rationale for the bill is a desire to "control the liability costs of an expected blizzard of lawsuits triggered by the millennium bug."[74] This is a crucial objective for California, since it is a Mecca for software companies and the high tech industry generally. Making the jurisdiction more friendly to prospective defendants of the bug will help promote and foster their high tech industry.

Critics such as California lawyer Dean Moorehous claim that the bill actually creates less predictability in litigation, since it will "spark confusion about the appropriate measure of damages in Year 2000 failure cases."[75] Moorehous also claims that there is no solid rationale for limiting recovery for breach of fiduciary duties or securities fraud

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[73] Information Technology Association of America "Year 2000 Home Page" online: <www.itaa.org/year2000/legis.htm> (date accessed: March 2, 1999).

[74] E. Luening, CNET NEWS.COM "Bill would curb Year 2000 suits" online: <www.news.com/News/Item/0,4,21217,00.html> (date accessed: April 25, 1998).

[75] *Ibid.*

claims. The bill proposes this by treating all Y2K suits the same. Since this bill has not yet passed committee, and may be destined to die on the order paper, Canada might be best to take Moorehous' comments to heart and find non-statutory limitations for Y2K. The existing Canadian federal legislation as demonstrated in this paper, is already fit to deal with Y2K suits by providing possible claims for potential complainants, and realistic defenses for directors and officers.

Legislative proposals will not solve the problem for Canadian companies. Even if due diligence and recovery limits are codified, companies will still need to prepare for and meet the challenge of Y2K. Although partial reliance on aspects of the business judgment rule and reliance on expert reports and dissents may be available to directors, they must look to their bottom line now, and consider how they can achieve due diligence for the sake of their company's business as well as its legal standing. Although Canadians are not typically as litigious as Americans, Canadian companies would be best served preparing for the worst and hoping for the best.