Bank of Canada Lender-of-Last-Resort Policies

In common with central banks around the world, one of the functions of the Bank of Canada is to act as a "lender of last resort." The Bank has recently reviewed its policies in this area. This article sets out the policies governing these activities.[1]

The Bank of Canada is the ultimate source of liquid funds to the financial system. As such, it routinely provides liquidity to facilitate payments settlement and responds in various ways to exceptional or emergency situations. The Bank of Canada has three distinct roles as a lender of last resort (LLR).

- The Bank facilitates the settlement of payments systems by routinely extending overnight credit to participants in the Large Value Transfer System (LVTS) through the Standing Liquidity Facility (SLF), to cover temporary end-of-day shortfalls in settlement balances that can arise in the daily settlement of payments.
- For solvent financial institutions requiring more substantial and prolonged credit, the Bank can provide Emergency Lending Assistance (ELA). ELA is intended to overcome a market failure associated with financial institutions that have a significant share of their liabilities as "deposits" (fixed-value promises to pay, redeemable at very short notice) and whose assets are generally highly illiquid.

The Bank of Canada Act requires that such lending be secured by collateral pledged by the borrowing institution. It is the policy of the Bank to lend only to institutions that are judged to be solvent in order to mitigate moral hazard that can arise from such potential intervention, and to avoid damaging the interests of unsecured creditors.

- In conditions of severe and unusual stress on the financial system more generally, the Bank has authority to provide liquidity through outright purchases of a wide variety of securities issued by any Canadian or foreign entities, including non-financial firms.

Standing Liquidity Facility

The purpose of the Standing Liquidity Facility is to support settlement in the payments system by providing collateralized, overnight loans to direct participants in the payments system who are experiencing temporary shortfalls in their settlement balances.[2]

Terms of the SLF

Provision of credit through the SLF is a routine activity, given under the following terms.

- The Bank provides overnight loans at the Bank Rate, an interest rate currently set at 25 basis points above the target overnight rate.
- The Bank is required by the Bank of Canada Act to secure all lending with collateral. The collateral eligible to secure credit from the SLF is the same as that eligible for intraday credit in the Large Value Transfer System.[3]
- Collateral is valued at market value less a discount. Discounts are applied mainly to protect the Bank from market risk (declines in the value of its security caused by changes in

1. The Bank last presented its views on its lender-of-last resort policies in its submission to the Estey Commission in 1986.
2. For a discussion of the LVTS and the Automated Clearing Settlement System (ACSS), see Dingle (1998) and Northcott (2002).
3. Eligible collateral includes securities issued or guaranteed by the Government of Canada, securities issued or guaranteed by a provincial government, Special Deposit Accounts held at the Bank, bankers' acceptances and promissory notes, commercial paper and short-term municipal paper, and corporate and municipal bonds. (The last three categories are subject to minimum credit ratings.)

market conditions), but these "haircuts" also reflect the credit risk of the issuer of the securities. Haircuts are set for broad classes of issuers and are larger for less-creditworthy issuers and for instruments with longer maturities.[4]

Access to Bank of Canada settlement accounts and the SLF

Direct participants in the LVTS are required under Canadian Payments Association (CPA) bylaws to have Bank of Canada settlement accounts and access to the SLF. Since November 2003, the net settlement obligations in the Automated Clearing Settlement System (ACSS) have settled through LVTS payments (on a next-day basis). As a result, all routine credit from the SLF is provided only in connection with the LVTS. (SLF credit would be provided directly for ACSS accounts only in the event of an LVTS outage.)

The Bank, therefore, provides a settlement and loan facility to any institution in the CPA as long as it

- participates directly in the LVTS or the ACSS,
- in the case of ACSS direct clearers, settles all net ACSS positions with LVTS payments credited to its ACSS settlement account at the Bank of Canada, and
- is able to provide the Bank with valid and enforceable first-priority security in collateral of a type that is acceptable to the Bank.

The Bank has additional requirements for access to its lending facility. These are motivated largely by the need for the Bank to have a legally well-founded security interest in the collateral pledged by an institution to support the SLF.

In addition, the various classes of financial institutions eligible for CPA membership, and therefore able to hold settlement accounts at the Bank, are subject to different bankruptcy laws and regulatory regimes.[5] Accordingly, for some classes of institution, the Bank probably would not be able to recover funds from any unsecured portion of a loan. The Bank, therefore, may allow haircuts on collateral that vary for different classes of borrowing institution, or may set different restrictions on the quantities of corporate securities that can be pledged by different classes of institutions.

As a result of these considerations, the Bank requires that an institution wishing to establish settlement and loan arrangements under the SLF

- provides acceptable legal documentation to support the Bank's security interest in pledged collateral, and
- accepts the collateral terms and conditions that may be set by the Bank, which take into account varying exposures to credit risk across different types of institutions.

The required legal documentation includes

- signed Bank of Canada account agreements and loan and security agreements,
- favourable legal opinions regarding the participant's ability to meet the terms and conditions of these agreements, and
- favourable legal opinions from foreign branches regarding the applicability of their home country's laws to these agreements.

In addition, upon application for a settlement facility, the Bank would notify the institution's regulator that the institution intends to open a settlement account. For a federally regulated financial institution, it is expected that such notification would be provided as a matter of course through the Financial Institutions Supervisory Committee (FISC).[6]

4. For a list of the relevant haircuts, see the payments section of the Bank of Canada's website, http://www.bankofcanada.ca/en/payments/rules.htm#collateral.
5. In 2001, eligibility for membership in the CPA was broadened beyond deposit-taking institutions to include life insurance companies, securities dealers that are members of the Investment Dealers Association or the Bourse de Montréal, and money-market mutual funds that meet certain requirements regarding the investment of their holdings and have access to an immediate and reliable source of liquidity.
6. The FISC is the primary interagency committee used to address issues of financial stability in Canada. It was established pursuant to the Office of the Superintendent of Financial Institutions Act for the purpose of facilitating consultations and the exchange of information among its members on all matters relating directly to the supervision of financial institutions. Its membership consists of the Super-intendent of Financial Institutions (who acts as chair), the Deputy Minister of Finance, the Chairperson of the Canadian Deposit Insurance Corporation, the Governor of the Bank of Canada, and the Commissioner of the Financial Consumer Agency of Canada.

Emergency Lending Assistance

While provision of credit through the SLF is a routine activity that facilitates the settlement of the payments system, Emergency Lending Assistance is extraordinary and provides credit to institutions judged to be solvent, but that are, nevertheless, facing serious and persistent liquidity problems.

More specifically, ELA is designed to address a particular kind of market failure associated with a financial institution that issues deposits (fixed-value promises to pay, redeemable at short notice) and that holds a portfolio of non-marketable assets that dominates its operations. A large and sudden increase in the redemption of deposits at such an institution could lead to its insolvency, even though it is otherwise sound, because its assets can be liquidated only with difficulty and are subject to discounts. As a practical matter, whether an institution is subject to this kind of market failure is a matter of judgment, and is increasingly unlikely, given financial developments in Canada, including changes in the regulatory environment.

Terms and conditions of ELA

Under the Bank of Canada Act, the Bank can provide ELA to a member of the CPA for a maximum term to maturity of six months. The loans can be renewed for periods up to six months as many times as the Bank wishes. The minimum rate that the Bank can charge on ELA loans is the Bank Rate. While the Bank has discretion to charge a higher interest rate if it sees fit, in its limited experience with ELA situations, the Bank has charged the Bank Rate.

As noted, the Bank is required under the Bank of Canada Act to secure all lending with collateral. For ELA, the Bank is willing to accept a broader range of collateral than that approved for credit under the SLF. In practice, this would typically mean taking a security interest in an institution's Canadian-dollar non-mortgage loan portfolio to support ELA, and the Bank would lend against this collateral.[7]

Taking such collateral would require that the Bank search security registers for prior security interests in the assets to be pledged, deal with any prior secured creditors, and complete special legal documentation and agreements with the institution—a process that could take two days to a week or more, depending on the complications that arise. This means that advance legal preparation is desirable in probable ELA cases, but this is at the discretion of the relevant financial institution.[8]

Eligibility Criteria for ELA

While the provision of ELA is extremely rare, the risk to the Bank is greater under ELA than under SLF.[9] Under SLF, there is no presumption of a protracted liquidity problem or solvency risk. In contrast, under ELA, there is clearly a significant liquidity problem affecting the institution, and a prima facie reason to question the solvency of the borrower prior to making an ELA loan. As well, under the SLF, only high-quality marketable securities are accepted as collateral, while under ELA, collateral that is subject to greater liquidity and credit risk is likely to be taken.

As a result of the significant inherent risk in ELA situations, the Bank takes more stringent measures with regard to ELA.

- ELA addresses a particular type of market failure (discussed above), and the Bank provides ELA only to classes of institutions that are vulnerable to this type of failure.
- To minimize moral hazard and to avoid impairing the interests of unsecured creditors of the institution, the Bank provides ELA only to institutions judged to be solvent. Therefore, a fundamental and critical consideration is whether the Bank can receive timely and accurate judgments on solvency—this is essential to the Bank's due diligence.
- Since the Bank relies primarily on prudential supervisors for this information, a sound supervisory framework is critical for ELA decisions and ELA management. Such a framework would include a clear supervisory mandate, adequate authority, a program of early intervention, and information-

7. Under the law, mortgages are considered to be a conveyance of "real property," which the Bank cannot take as collateral. In cases where the primary assets available to an institution to secure Bank lending are mortgages, the security interest would have to be structured as an assignment of the mortgage receivables only, and not as an assignment of the mortgages themselves.

8. In such a case, the Bank would register in advance its security in the public, personal property security registry of the institution's home province.

9. The last instance of such lending was in 1986, to the Continental Bank.

sharing protocols with the Bank. It would also provide a means to jointly establish remedial measures and to implement workout strategies. A strong framework mitigates incentives for supervisors to delay dealing with a problem institution; such forbearance could shift risks to the Bank.

- As with lending under SLF, it is important that the Bank have a valid first-priority security interest in any collateral pledged to support ELA.

Implications Regarding Eligibility for ELA

These considerations have the following implications for the eligibility of various classes of institutions for ELA.

- Federally incorporated banks (including foreign bank subsidiaries) and federally incorporated trust and loan corporations would be eligible for ELA.[10] These firms are susceptible to the relevant market failure (referred to above). The Bank can be confident of receiving timely and accurate information regarding the solvency of these institutions. And the federal supervisory regime provides a reliable means to establish remedial measures and to implement workout strategies. In addition, the Canadian Deposit Insurance Corporation can act as a limited provider of liquidity to its member institutions (both federal and provincial) through purchases of assets, and loans or advances (with or without security).
- Insurance companies, mutual funds, and investment dealers would not be eligible for ELA, since they do not issue deposits or hold a significant share of their assets in illiquid, hard-to-value claims.[11]
- Credit union locals and caisses populaires would not generally be eligible for ELA. In most cases, these institutions have access to provincial centrals, the Corporation de Fonds de Sécurité de la Confédération Desjardins (CFSCD), or the Credit Union Central of Canada (CUCC), for liquidity assistance.[12]
- In the case of an extraordinary, widespread event that would have significant, adverse consequences for a provincial credit union/caisse populaire system, the Bank would consider providing ELA through the CUCC, a provincial central, the Caisse centrale Desjardins, or the Fédération des caisses Desjardins, as appropriate, provided that legal arrangements satisfactory to the Bank were established by these entities.[13]
- With regard to foreign bank branches, in a prospective ELA situation, it could be difficult to receive timely and accurate information on solvency from foreign supervisors, and to successfully manage the conflicts in incentives faced by the relevant supervisors when interacting with the Bank in such cases. There can also be legal complications and risks with regard to establishing a security interest for the Bank in some of the assets of these institutions in an ELA situation. Accordingly, foreign bank branches would not normally be eligible for ELA. Nevertheless, in very exceptional circumstances where the home central bank was unable to lend for a day or two (for operational reasons), the Bank of Canada could provide interim lending for a very brief period, typically against collateral that would be eligible for credit through the SLF.

Managing ELA

The management of ELA with respect to financial institutions subject to federal regulation would be in close collaboration with the Financial Institutions Supervisory Committee, which serves

10. In the case of trust companies, the "in-trust" nature of the assets held by such a firm means that ELA could be provided only through a loan secured by company assets, or through an outright purchase of assets, associated with provisions to sell the assets back to the trust company at predetermined prices.
11. However, see the section on "Systemic Risk and Bank of Canada Intervention, p. 54."
12. As well, very few credit union locals or caisses populaires are members of the CPA.
13. Such lending could require the establishment of particular legal mechanisms to allow the Bank to take a security interest in the assets of a credit union or caisse populaire. (See, for example, footnote 7 above.) It could also require a process of rehypothecation of the collateral to the provincial central, the CUCC, or Caisse centrale Desjardins. These arrangements can be complex and costly to set up. The Bank is prepared to work with relevant institutions to prepare the legal groundwork for such arrangements.

as a forum to exchange information relevant for supervision and to coordinate the strategies of its member agencies when dealing with troubled institutions subject to federal regulation.

- The FISC—through the Office of the Superintendent of Financial Institutions (OSFI)—would normally be aware of prospective ELA situations. In this regard, the Bank would keep the FISC informed regarding such possibilities, and vice versa.
- The Bank would notify the FISC immediately in the event that the Bank provided ELA to an institution.
- The Bank would use the FISC as the primary forum for the exchange of information regarding an institution receiving ELA, and the FISC or a relevant subcommittee would meet at least weekly to consider the situation.
- The borrowing institution would be required to provide a business plan to OSFI that outlined remedial measures to rectify its liquidity problems, and to provide increased reporting (data and other information) on its evolving situation.
- Contingency planning would also be conducted at the FISC. Such planning could include possible private sector solutions, as well as alternative work-out arrangements.

While the repayment of SLF loans is routine, terminating ELA is likely to be more complicated. If all goes well, the management of ELA would focus on normalizing the institution's position in the market, or facilitating a merger of the institution, such that ELA could be expeditiously withdrawn.

Following are the main features of the Bank's ELA management procedures.

- The Bank's Financial System Committee[14] would meet immediately and then at least weekly to review any ongoing ELA, formally reconsider the borrowing institution's solvency and the appropriateness of continuing to provide ELA, as well as the limits on lending to the institution.
- If, at any time, the Bank wanted additional information concerning the financial condition of the borrower, the Bank could hire a third-party agent to perform an examination of the institution.
- The ELA loan agreements between the Bank and the borrowing institution would create a one-day, revolving facility in which the Bank would have discretion to decline to make any further one-day loans. This would allow the Bank to readily cease ELA if it judged that the borrowing institution was insolvent, or that the available collateral to support ELA was at a higher risk of being inadequate.
- The Bank would cease ELA when this was judged by the Bank to be appropriate, most notably, when the institution was judged by the Bank to be insolvent, on the basis of information received from OSFI and possibly third-party agents, or when available collateral was inadequate to support further ELA.
- If the Bank became aware of a borrowing institution's insolvency or pending insolvency, it would refrain from taking any new collateral as security for outstanding advances made when the institution was still solvent. At the same time, the FISC would be working to implement an orderly work-out.

Foreign currency ELA

Liquidity support in a foreign currency is an important consideration for Canadian financial institutions, given the significance of foreign currency activities (mainly U.S. dollar) for many of these institutions. However, providing liquidity support in a foreign currency is considerably more difficult than providing Canadian-dollar ELA: while the Bank can create liquidity in Canadian dollars, it cannot do so in foreign currencies.

- Financial institutions are responsible for ensuring that they have reliable arrangements for private sector liquidity support in foreign currencies important to their business.
- Canadian financial institutions should arrange access through foreign central banks to liquidity facilities in those currencies important to their business.
- Provided that the institution qualified for ELA, the Bank could lend Canadian dollars

14. The Financial System Committee comprises the six members of the Bank's Governing Council, the General Counsel/Corporate Secretary, the Regulatory Policy Adviser, and the Chief of the Communications Department.

on a collateralized basis to the illiquid institution which, in turn, could purchase the needed foreign currency in the market with those Canadian dollars.

The Relationship between the SLF and ELA

As noted above, direct participation in the LVTS requires (under CPA bylaws) access to settlement accounts at the Bank of Canada and access to the SLF. The Bank provides loans through the SLF to facilitate the efficient operation of the payments system, provided that the Bank's requirements for SLF (described above) are satisfied.

As discussed, lending under the SLF is routine and low risk: in SLF lending, there are no concerns about the solvency of the borrowing institution; SLF lending is collateralized by high-quality, discounted securities; and, for any given financial institution, SLF lending is transitory (overnight).

In contrast, ELA is, by its very nature, a high-risk undertaking: ELA arises when there are concerns about the solvency of an institution; ELA would probably be secured by collateral that is subject to greater risks; and the potential engagement by the Bank in ELA is indefinite.

It is possible that an institution's borrowing relationship with the Bank might evolve from SLF to ELA under some circumstances. This would have implications for the Bank's management of that lending and for the Bank's relationship with that institution. Accordingly, the Bank monitors the use of the SLF to identify whether a financial institution is using the SLF for ELA-type borrowing. In such a case, the following would apply.

- If the institution were considered to be eligible for ELA, the Bank would initiate internal and FISC-related processes for managing ELA activity, and would require the institution to sign additional ELA legal documentation.
- For other LVTS participants that are not considered to be eligible for ELA, upon identifying ELA-type borrowing, the Bank would indicate to the financial institution that additional borrowing based on a broader range of collateral would not be granted, and the Bank would contact the institution's regulator. The Bank would deny access to additional liquidity once the institution had exhausted its SLF-eligible collateral.

Systemic Risk and Bank of Canada Intervention

Under extreme conditions, the Bank can provide liquidity to any firm. The Bank of Canada Act, paragraph 18 (g.1), gives the Bank the authority, under conditions of "severe or unusual stress on a financial market or financial system" to provide liquidity via outright purchases of a wide variety of claims issued by any Canadian or foreign entities, for the purpose of promoting the stability of the financial system.[15]

In other words, the Bank has the authority to provide liquidity to a broad range of financial and non-financial institutions when the Governor of the Bank judges that such transactions are justified to safeguard the safety and soundness of Canada's financial system. All such transactions would be fully disclosed and justified in the Bank's public statements, including the *Annual Report*. The Bank would also need to publish in the *Canada Gazette* notice that it believes that there is a situation of severe and unusual stress on the financial system.

More specifically, Section 19 of the Bank of Canada Act states that if the Bank takes any action under paragraph 18 (g.1) it must publish a notice in the *Canada Gazette* that "the Governor has formed an opinion that there is a severe and unusual stress on a financial market or financial system." The notice is to be published as soon as the Governor is of the opinion that its publication will not materially contribute to the stress to which the notice relates.

If problems in a financial institution not eligible for ELA under the above policy (but a CPA member) could, in the Bank's judgment, lead to severe or unusual stress on a financial market or financial system, then the Bank may choose to make a liquidity loan instead of making purchases or undertaking repos under paragraph 18 (g.1).

15. This does not include more general liquidity provided through monetary policy actions. The policies explained here are over and above the liquidity provided in response to shocks to the financial system, such as the stock market crash of 1987 or the terrorist attacks of 11 September 2001.

Forced LVTS Loans

A final category of Bank lending can occur in the context of a default in the LVTS. In the event that an LVTS participant defaults, the Bank of Canada could be obliged (under LVTS bylaws) to knowingly lend to an insolvent institution, on the basis of collateral pledged earlier.[16] More specifically, the Bank would be obliged to lend to the defaulting institution on the day of failure against previously pledged collateral to settle that member's obligations to other participants in the LVTS, and so protect against systemic risk.

In the extremely unlikely event of the failure of more than one LVTS participant on the same day during LVTS operating hours, where the sum of the exposures of the failed participants exceeds the value of all the collateral pledged in the system, the Bank of Canada guarantees settlement of the LVTS.[17] In this event, the Bank could be obliged to lend to a failed institution, on a partially unsecured basis, to ensure settlement of the LVTS and so protect against systemic risk.

As noted, the likelihood of this scenario is extremely remote, and the fact that participants pledge collateral sufficient to cover the single largest possible default provides a large element of co-insurance (a deductible) that provides strong incentives for LVTS participants to manage their risks prudently in the system.

16. To secure potential payment obligations, LVTS participants pledge in advance sufficient collateral to cover the largest single possible settlement obligation.
17. The Bank provides such a guarantee to ensure certainty of settlement of the LVTS in all possible circumstances. For more on these points, see Goodlet (1997).

References

Dingle, J. 1998. "The LVTS—Canada's large-value transfer system." *Bank of Canada Review* (Autumn): 39–55.

Goodlet, C. 1997. "Clearing and settlement systems and the Bank of Canada." *Bank of Canada Review* (Autumn): 49–64.

Northcott, C.A. 2002. "Systemic Risk, Designation, and the ACSS." *Bank of Canada Financial System Review* (December): 29–35.