



Telecom Regulatory Policy CRTC 2018-377

PDF version

Reference: Telecom Notice of Consultation 2017-112

Ottawa, 27 September 2018

Public record: 1011-NOC2017-0112

Development of the Commission's Broadband Fund

A country the size of Canada, with its varying geography and climate, faces unique challenges in providing similar broadband Internet access services for all Canadians. Private sector investments, as well as funding programs from various levels of government, support the expansion of these services outside densely populated urban centres. However, many Canadians, particularly in rural and remote areas, do not yet have access to broadband Internet access services that are comparable to those offered to the vast majority of Canadians in terms of speed, capacity, quality, and price.

In Telecom Regulatory Policy 2016-496, the Commission established the following universal service objective: Canadians, in urban areas as well as in rural and remote areas, have access to voice services and broadband Internet access services, on both fixed and mobile wireless networks. To help provide Canadians with access to these services, the Commission established the Broadband Fund, which will provide \$750 million over five years.

In this decision, the Commission addresses matters related to the Broadband Fund, including its governance, operating, and accountability frameworks, as well as eligibility and assessment criteria for proposed projects.

The objective of the Broadband Fund is to fund projects to build or upgrade access and transport infrastructure for fixed and mobile wireless broadband Internet access services to achieve the universal service objective, in order to close the gap in connectivity in underserved areas. The Commission will be responsible for the selection and monitoring of projects to be funded. For the main component of the Fund, the Commission will consider applications to build or upgrade access and transport infrastructure for fixed and mobile wireless broadband Internet access services in underserved areas. The Commission will use a separate evaluation process for applications to serve satellite-dependent communities.

The Commission will take a comparative selection approach to evaluating and selecting projects for funding, which will be done in three separate stages: the eligibility, assessment, and selection stages. Specific criteria and considerations, such as the efficient use of funds, funding for projects in multiple regions, the type of project, as well as any affected Indigenous and official language minority communities, are set out in this decision.

The Central Fund Administrator of the National Contribution Fund will administer the Broadband Fund. The Administrator will be responsible for the collection of contributions and the

distribution of funding to recipients selected by the Commission. The Commission will publish decisions to award funding to Broadband Fund recipients for their proposed projects. These decisions will include conditions related to project timelines, reporting, auditing, and material changes.

In preparation for the Commission's first call for applications, the Commission will publish a preliminary application guide. Concurrently with a call for applications, the Commission will publish an application guide and eligibility maps consistent with the scope of that call.

Background

1. The Commission seeks to ensure that all Canadians have access to a world-class communication system. Telecommunications services play an important role in the lives of all Canadians, enabling them to participate in today's digital economy and to access, for example, health care, education, government, and public safety services. As the regulator of Canada's communication system, the Commission aims to provide Canadians with, among other things, quality and innovative communications services at affordable prices.
2. The Commission's mandate focuses on achieving the policy objectives established in the *Telecommunications Act*. For example, the objective stated in paragraph 7(a) of the *Telecommunications Act* is to facilitate the orderly development throughout Canada of a telecommunications system that serves to safeguard, enrich, and strengthen the social and economic fabric of Canada and its regions; and the objective stated in paragraph 7(b) is to render reliable and affordable telecommunications services of high quality accessible to Canadians in both urban and rural areas in all regions of Canada.

Telecom Regulatory Policy 2016-496

3. In Telecom Regulatory Policy 2016-496, the Commission stated that it would begin to shift the focus of its regulatory frameworks from wireline voice services to broadband Internet access services. The Commission established the following universal service objective:

Canadians, in urban areas as well as in rural and remote areas, have access to voice services and broadband Internet access services, on both fixed and mobile wireless networks.
4. The Commission further determined that it would establish a broadband funding regime (referred to hereafter as the Broadband Fund) to assist in (i) funding continuing access to the basic telecommunications services that form part of the universal service objective, and (ii) closing the gaps in connectivity.
5. The Commission established the following criteria to measure the successful achievement of the universal service objective:
 - Canadian residential and business fixed broadband Internet access service subscribers should be able to access speeds of at least 50 megabits per second (Mbps) download and 10 Mbps upload, and to subscribe to a service offering with an unlimited data allowance; and

- the latest generally deployed mobile wireless technology should be available not only in Canadian homes and businesses, but on as many major transportation roads as possible in Canada.
6. The Commission indicated that in some underserved areas, achieving the universal service objective would likely need to be accomplished in incremental steps due to many factors, such as geography, the cost of transport capacity, the distance to points of presence (PoPs),¹ and the technology used. According to the Commission's 2017 *Communications Monitoring Report*, fixed broadband Internet access service that meets the download speed target of the universal service objective was available to 84% of Canadian households as of 31 December 2016. The Broadband Fund will facilitate building the infrastructure required to provide broadband services in underserved areas, in order to support achieving the universal service objective's target speeds in 90% of Canadian households by the end of 2021, and in 100% of Canadian households within 10 to 15 years of the issuance of Telecom Regulatory Policy 2016-496.
 7. Finally, in Telecom Regulatory Policy 2016-496, the Commission included its determinations and preliminary views with respect to many elements of the Broadband Fund, including guiding principles, fund design, eligibility and assessment criteria, governance structure, and accountability framework. The Commission also stated that it would initiate a follow-up proceeding to examine its preliminary views and other matters related to the establishment of the Fund, which it did through Telecom Notice of Consultation 2017-112.
 8. Subsequently, in Telecom Decision 2018-241, the Commission further defined the universal service objective by establishing the broadband quality of service that should be provided to all Canadians. Specifically, the Commission determined that fixed broadband Internet access service is of high quality if it meets a round-trip latency threshold of 50 milliseconds and a packet loss threshold of 0.25%, both measured during peak times. The Commission also initiated a proceeding, through Telecom Notice of Consultation 2018-242, to establish an appropriate quality of service metric for jitter to define high-quality fixed broadband Internet access service.

Telecom Notice of Consultation 2017-112

9. Through Telecom Notice of Consultation 2017-112, the Commission initiated the proceeding to develop the Commission's broadband funding regime, including its governance, operating, and accountability frameworks, as well as eligibility and assessment criteria for proposed projects. The Commission also invited comments on its preliminary views set out in Telecom Regulatory Policy 2016-496.
10. The Commission received over 90 interventions from parties including telecommunications service providers, consumer groups, provincial, territorial, municipal, and regional governments, Indigenous groups and communities, and individual Canadians.

¹ A PoP is a point in the network that connects the transport infrastructure to the local access infrastructure.

Objective of the Broadband Fund and funding considerations

11. The objective of the Broadband Fund is to fund projects to build or upgrade access and transport infrastructure for fixed and mobile wireless broadband Internet access services to achieve the universal service objective, in order to close the gap in connectivity in underserved areas.
12. However, the Commission's Broadband Fund is only one part of the wider broadband Internet funding ecosystem, along with private investment from Internet service providers (ISPs) and other government funding sources. The Broadband Fund will not be a substitute for either market forces or public funding initiatives, but will work in concert with them to provide Canadians with access to a world-class communication system. The Commission has taken this into account when designing many elements of the application, evaluation, and project selection processes set out in this decision.
13. By outlining in advance all the elements that the Commission will consider in awarding funding, the Commission expects to receive complete applications for the eligible geographic area(s). Accordingly, the Commission does not intend to consider incomplete applications or engage in negotiations during the selection process.
14. The main component of the Broadband Fund will provide funding for projects in all areas except in satellite-dependent communities and covers all broadband technologies, including direct-to-home (DTH) satellites.² For this component, the Commission will consider applications to build or upgrade access and/or transport infrastructure for fixed and mobile wireless broadband Internet access services. For the other component (referred to hereafter as the satellite component), the Commission will consider projects to increase satellite transport capacity, infrastructure projects, and some operational costs in satellite-dependent communities.
15. The Commission has established the different elements of the Broadband Fund taking into account the following policy considerations:
 - creating a clear and transparent funding process that is flexible enough to adapt to the ongoing broadband Internet access service needs of Canadians, and that remains in place for as long as the Commission considers it is needed;
 - allowing for any type of technology to be eligible for funding;
 - providing an opportunity for various types of applicants, such as established carriers, new entrants, and community organizations, to apply for funding;
 - funding projects that would not be viable without Commission funding;

² In the DTH model, each customer premises has an antenna installed, through which traffic is uplinked and downlinked directly to the satellite.

- funding projects that will provide ongoing improved-quality broadband Internet access services to Canadians at the price and service levels to which the funding recipients commit;
- minimizing the regulatory burden to the greatest extent possible;
- minimizing the administrative costs to the greatest extent possible;
- providing effective stewardship of the money collected from telecommunications service providers; and
- distributing funding efficiently while monitoring each project during implementation.

Policy Direction

16. The Commission has also made its determinations in light of the policy objectives set out in section 7 of the *Telecommunications Act* and taking into consideration the Policy Direction.³
17. The Policy Direction states that the Commission, in exercising its powers and performing its duties under the *Telecommunications Act*, shall implement the policy objectives set out in section 7 of that Act, in accordance with paragraphs 1(a), (b), and (c) of the Policy Direction.
18. The issues considered in this proceeding relate to the implementation of the Broadband Fund, through which funding will be allocated for broadband infrastructure projects to help all Canadians participate in the digital economy.
19. The Commission is satisfied that the determinations in this decision are consistent with the Policy Direction, given that the Broadband Fund (i) will provide funding subject to certain conditions and only in underserved areas that are uneconomic to serve; (ii) is narrow in scope, in that it is designed to support broadband network builds and improvements in geographic areas where they would not otherwise occur; (iii) will be available for fixed, mobile wireless, and satellite technology; (iv) will require funding recipients for transport projects to offer wholesale open access to competitors; and (v) can be accessed by a wide range of applicants.
20. The Broadband Fund will complement – and not replace – existing and future private sector investments and other government funding within the broader funding ecosystem. Furthermore, the Commission’s determinations will advance the policy objectives set out in paragraphs 7(a), (b), (c), (f), (g), and (h) of the *Telecommunications Act*. By extending broadband to underserved areas, the Broadband Fund – and, in particular, the Commission’s determinations regarding the different eligibility and assessment criteria for projects – will, for example, serve to enrich and strengthen the social and economic fabric of Canada and its regions, improve the affordability and reliability of telecommunications services to

³ *Order Issuing a Direction to the CRTC on Implementing the Canadian Telecommunications Policy Objectives*, P.C. 2006-1534, 14 December 2006

Canadians, encourage innovation in the provision of telecommunications services, and respond to the economic and social requirements of users in previously underserved areas.

Issues

21. The Commission has identified the following issues to be addressed in this decision:

- What governance structure should be used to administer the Broadband Fund?
- Which approach should be used to select projects for funding?
- How will projects be evaluated and selected?
- What requirements should be imposed on funding recipients for selected projects?
- How will projects for satellite-dependent communities be evaluated and selected?
- What are the expected follow-up activities and next steps?

What governance structure should be used to administer the Broadband Fund?

Background

22. Subsection 46.5(1) of the *Telecommunications Act* states that the Commission may require any telecommunications service provider to contribute, subject to any conditions that the Commission may set, to a fund to support continuing access by Canadians to basic telecommunications services. In Telecom Regulatory Policy 2016-496, the Commission determined that (i) fixed and mobile wireless broadband Internet access services, and (ii) fixed and mobile wireless voice services are basic telecommunications services within the meaning of subsection 46.5(1) of the *Telecommunications Act*. It is pursuant to this subsection that the Commission established the Broadband Fund.
23. Subsection 46.5(2) of the *Telecommunications Act* provides that the Commission must designate a person to administer the Fund. Paragraph 46.5(3)(a) provides that the Commission may regulate the manner in which the administrator administers the fund.
24. In Telecom Regulatory Policy 2016-496, the Commission determined that it would retain oversight of the Fund and approve the projects to be funded. The Commission further determined that the Broadband Fund would involve two functions: the project management function (the implementation and operation of the competitive process) and the accounting function (the collection of contributions and the distribution of funds). These functions could be managed with the support of one or two third-party administrator(s).
25. In Telecom Notice of Consultation 2017-112, the Commission expressed the preliminary view that the project management function could be governed by a board of directors that would have full independence from any recipients of funding from the Broadband Fund (such as ISPs). The Commission also asked parties to comment on whether the accounting function should be performed by the Canadian Telecommunications Contribution Consortium Inc.

(CTCC). The CTCC currently serves as the oversight board for the Central Fund Administrator, the designated third-party administrator of the National Contribution Fund.⁴

Project management function

Positions of parties

26. Saskatchewan Telecommunications (SaskTel), Shaw Cablesystems G.P. (Shaw), and TELUS Communications Inc. (TCI)⁵ submitted that it would be very difficult to fill a board with individuals who are sufficiently knowledgeable of the telecommunications industry while being independent of the industry and potential applicants. Shaw also submitted that the provision of confidential information to a third party could be problematic.
27. Shaw, along with other parties, further argued that it would be expensive and cumbersome to create a new board and a third-party administrative body. Shaw and TCI suggested that using a third party for project management would yield (i) tremendous inefficiencies stemming from a duplication of resources that already exist in other programs such as Innovation, Science and Economic Development Canada's (ISED) Connect to Innovate (CTI) program; and (ii) poor results due to the administrator's inherent learning curve.
28. Many parties, including the Canadian Communication Systems Alliance⁶ and the Independent Telecommunications Providers Association (collectively, the CCSA-ITPA); DERYtelecom Inc. (DERYtelecom); Bragg Communications Incorporated, carrying on business as Eastlink (Eastlink); Quebecor Media Inc., on behalf of Videotron Ltd. (Videotron);⁷ SaskTel; Shaw; SouthWestern Integrated Fibre Technology Inc. (SWIFT); TBayTel; TCI; and Xplornet Communications Inc. (Xplornet), as well as the Government of Nunavut, suggested either assigning ISED as the project manager or leveraging ISED's expertise through collaboration between ISED and the Commission. These parties argued that leveraging the Commission's and/or ISED's resources would be efficient, avoid duplication and unnecessary delays, and result in more money being available to fund broadband projects.

⁴ The National Contribution Fund is a national revenue-based collection mechanism to subsidize the provision of basic telecommunications services in rural and remote parts of Canada. Contributions are collected from telecommunications companies and are currently distributed to subsidize the provision of residential local voice telephone service in high-cost serving areas and of video relay service. The local service subsidy will be phased out over three years starting in January 2019, pursuant to Telecom Regulatory Policy 2018-213.

⁵ In this proceeding, submissions were received from TELUS Communications Company (TCC). However, effective 1 October 2017, TCC's assets were legally transferred to TCI and TCC ceased to exist. For ease of reference, "TCI" is used in this decision.

⁶ In this proceeding, submissions were received from the Canadian Cable Systems Alliance. However, effective 1 May 2018, the association was rebranded as the Canadian Communication Systems Alliance. For ease of reference, "Canadian Communication Systems Alliance" is used in this decision.

⁷ In this proceeding, submissions were received from Videotron G.P. However, effective 29 December 2017, all of Videotron G.P.'s assets and operations were transferred to Videotron Ltd., and Videotron G.P. was subsequently dissolved. For ease of reference, "Videotron Ltd." is used in this decision.

29. Cogeco Communications Inc. (Cogeco) proposed that the Commission should take on the project management function, including dedicated staff within the Commission and potentially some representatives from ISED.
30. The National Pensioners Federation and the Public Interest Advocacy Centre (collectively, NPF-PIAC) and SSi Micro Ltd. (SSi) raised concerns that involving ISED in the Broadband Fund's project management might compromise the Commission's function as an arm's-length, independent administrative tribunal by creating the perception of political involvement in an independent regulatory fund.
31. However, most parties supported ISED's involvement in the Broadband Fund, as long as ISED is not involved in decisions or policy making. Parties including the First Mile Connectivity Consortium (FMCC), OpenMedia Engagement Network (OpenMedia), Rogers Communications Canada Inc. (RCCI), and SSi, as well as the Kativik Regional Government (KRG), suggested a limited role for ISED, in which it could provide advisory or technical assistance to the Commission based on its expertise.

Commission's analysis and determinations

32. The Commission's preliminary view was that the project management function could be managed by an independent third party with a board that is completely independent from possible funding recipients. However, parties expressed numerous concerns with this preliminary view. The Commission acknowledges that finding qualified and independent board members could be a challenge, since an independent board would likely lack the expertise and in-depth knowledge of a representative board, but a representative board could present potential conflicts of interest. The Commission also recognizes that the establishment of a board could be a lengthy process, followed by other processes to appoint an administrator and to set up the Broadband Fund. Finally, the Commission acknowledges that confidentiality issues could arise from the sharing of applicant and project information with a third party.
33. With respect to the suggestion that ISED be appointed to perform the project management function, it would be neither appropriate nor feasible for the Commission as an independent statutory authority to appoint ISED to this role.
34. The Commission acknowledges that the use of its own expertise, staff, and institutional capability for the implementation and operation of the selection process, as well as the monitoring and enforcement of the conditions of funding, would be efficient, cost-effective, and timely. Specifically, the Commission considers that if it were to carry out the project management function, this would (i) avoid duplication of existing structures and expertise; (ii) ensure that all related activities are conducted in full compliance with all applicable laws, rules, and regulations; (iii) reduce administrative processes, which would significantly decrease the length of time required before a call for applications can be issued; (iv) facilitate applicants' participation, since many applicants would already have knowledge of the Commission and experience participating in its processes; and (v) resolve any confidentiality issues that could arise if a third party were involved.

35. In light of the above, the Commission determines that it will be responsible for the project management function and carry out the following tasks involved in the selection and monitoring of funding recipients:
- developing an application guide and a web portal;
 - undertaking a mapping exercise to establish eligible project areas;
 - developing resources for applicants;
 - issuing calls for applications;
 - reviewing and screening applications against eligibility and assessment criteria;
 - approving projects for funding;
 - establishing funding conditions;
 - verifying project milestone completion;
 - assessing and reporting on funding recipients' progress, performance, and compliance with funding conditions;
 - enforcing compliance with funding conditions, if required; and
 - publishing reports on the Broadband Fund's performance.
36. The Commission acknowledges that ISED has tools, processes, and expertise that could be used to support the Broadband Fund. Where appropriate, the Commission will endeavour to benefit from ISED's experience and expertise.

Accounting function

Positions of parties

37. Almost all parties, including ISPs such as Bell Canada, the CCSA-ITPA, the Canadian Network Operators Consortium Inc. (CNOc), Cogeco, Eastlink, RCCI, SaskTel, Shaw, SSI, TBayTel, Videotron, and Xplornet; consumer groups such as NPF-PIAC; and governments such as those of Nunavut and Ontario, supported designating the CTCC to oversee the accounting function of the Broadband Fund.
38. The CTCC submitted that the arrangement of the Central Fund Administrator acting under the CTCC should be adopted for the accounting function of the Broadband Fund, since this would fit comfortably with their existing roles and responsibilities, as well as with those of the Commission, and would avoid considerable duplication of effort and unnecessary costs. The CTCC added that this arrangement would be the most efficient and cost effective for the industry and the Canadian public.

Commission's analysis and determinations

39. The current accounting structure of the National Contribution Fund is well established, well known by participants, and efficient. Given that broadband funding is part of the National Contribution Fund, and that the existing structure works well, the Commission considers that the Central Fund Administrator should, in its role as administrator of the National Contribution Fund, be responsible for the collection of contributions and distribution of broadband funding to recipients identified by the Commission.
40. The CTCC and the Central Fund Administrator will continue to be responsible for the following, which includes broadband funding:
 - implementing Commission decisions with respect to the CTCC's operating procedures and the contribution pay-in rate;
 - maintaining the system used by telecommunications service providers to report their revenue information;
 - collecting monthly revenue information from telecommunications service providers;
 - collecting contributions from telecommunications service providers;
 - making payments to funding recipients based on the schedule set out by the Commission;
 - updating and enforcing the National Contribution Fund Administration Agreement, which is a contract between the CTCC, the Central Fund Administrator, each telecommunications service provider that is required to contribute to the National Contribution Fund, and each recipient of funding from that fund; and
 - conducting an annual audit of the National Contribution Fund's financial statements and the Central Fund Administrator's compliance with the National Contribution Fund Administration Agreement.
41. As stated in its preliminary view, the Commission will be responsible for the following:
 - approving the procedures for the accounting function;
 - determining the revenue-percent charge contribution pay-in rate on an annual basis;
 - determining the allowable deductions within the contribution regime;
 - performing other related tasks, such as reviewing telecommunications service providers' annual contribution-eligible revenue reports; and
 - providing the Central Fund Administrator with a list of recipients and payment schedules.

42. This structure is consistent with the structure that is already in place for the local service subsidy.
43. It will be necessary for the CTCC to amend its administrative agreements with contributors to and recipients of funding from the National Contribution Fund to include provisions related to the funding distribution model of the Broadband Fund.
44. Specifically, the procedures set out in the CTCC's Procedures for the Operation of the National Contribution Fund, as revised in Telecom Decision 2018-60, will need to be amended and expanded to add the following activities related to the Broadband Fund:
 - amend the administrative agreements the CTCC has with contributors to and recipients of funding from the National Contribution Fund, including expanding the provisions dealing with (i) what constitutes "default" by an eligible recipient and the available remedies in the case of default, and (ii) dispute resolution;
 - develop payment procedures for the efficient distribution of funding;
 - direct the Central Fund Administrator to make payments to recipients of funding from the Broadband Fund based on the distribution schedule set out by the Commission; and
 - conduct an annual review of its systems and processes to ensure that it has followed Commission-approved procedures.
45. In light of the above, the Commission **directs** the CTCC to file for Commission approval, within **six months** of the date of this decision, amended procedures related to the operation of the Broadband Fund.

Audit and management committee

46. In Telecom Regulatory Policy 2016-496, the Commission noted that currently, the board of directors of the third-party administrator of the local service subsidy has an audit committee to ensure that the administrator has followed Commission-approved procedures, collected the correct amount of contribution, and paid the correct amount of subsidy. The Commission added that the accounting function of the Broadband Fund would require similar oversight. The Commission stated that accordingly, the board of directors of the third-party administrator for the accounting function of the Broadband Fund would be required to establish an audit committee.
47. Currently, the CTCC's board of directors engages an external auditor to provide an annual report on the Central Fund Administrator's performance and financial statements. The annual reports are presented to and reviewed by the CTCC's audit and management committee. The Commission considers that the use of an auditor has proven to be an effective safeguard and that the CTCC should continue to engage an external auditor to conduct annual external audits of the administration and fund distribution of the Broadband Fund.
48. In light of the above, the Commission determines that the CTCC is also required to engage an external auditor to annually audit the financial statements of the National Contribution Fund

and the Central Fund Administrator's compliance with the National Contribution Fund Administration Agreement, for the administration of the Broadband Fund.

Which approach should be used to select projects for funding?

Positions of parties

49. Most parties proposed that the Commission use a comparative selection approach to evaluate and select projects for funding. This would entail conducting a qualitative assessment of applications based on certain criteria.
50. Bell Canada and NPF-PIAC proposed that the Commission use a reverse auction approach. This would entail conducting a quantitative assessment of applications whereby the proposed project with the lowest amount of requested funding per eligible subscriber would obtain funding.
51. Under Bell Canada's and NPF-PIAC's proposal, applications would be assessed in two stages: (i) the eligibility stage, in which proposed projects would be reviewed based on pre-established minimum requirements for deployment and service standards; and (ii) the bidding stage, in which a simultaneous, multiple-round, decreasing-bid auction would be conducted.
52. Bell Canada and NPF-PIAC submitted that the reverse auction approach would be the simplest and most efficient means of awarding funding. NPF-PIAC saw that approach as a means to provide affordable, universal service objective-level broadband services to one million homes in five years. Videotron supported this approach and submitted that it would be more objective than the comparative selection approach since it limits evaluation criteria.
53. Parties' reactions to Bell Canada's and NPF-PIAC's proposed reverse auction approach were largely negative. Many parties, such as the CCSA-ITPA, CNOC, the FMCC, and the Government of Nunavut, submitted that reverse auctions typically favour large bidders that are familiar with and staffed to support the bidding process. The CCSA-ITPA added that the reverse auction approach would reduce the flexibility to fund projects that meet the unique needs of a given community.
54. CNOC submitted that the reverse auction approach does not take into account factors such as projects' sustainability, wholesale access, scalability, and network resiliency, as well as the communities that need assistance the most. RCCI also opposed the reverse auction approach on the basis that it (i) is biased towards access projects, (ii) focuses on areas that are the easiest and least costly to serve, and (iii) would likely result in funding projects that do not actually require financial assistance to improve broadband Internet access service.
55. The British Columbia Broadband Association (BCBA) submitted that while the outcome of the reverse auction approach would be transparent from a cost perspective, it would be difficult to ensure transparency in the process of selecting and defining projects to present for auction.

56. CNOC submitted that the comparative selection approach encourages innovation, community engagement, and applicant diversity. CNOC, SaskTel, and TBayTel added that although the comparative selection approach may have a higher administrative overhead, it would result in a better use of funds and greater overall benefits to all stakeholders.
57. RCCI and TBayTel added that the comparative selection approach (i) is well established and familiar to most potential applicants, (ii) would enable existing tools and resources to be adapted, and (iii) would provide for a broader range of participants and proposals.

Commission's analysis and determinations

58. The Commission has reviewed Bell Canada's and NPF-PIAC's proposed reverse auction approach and considers that while such an approach may result in a lower funded amount per household and an easier assessment of funding applications, its narrow focus on costs does not allow for a more fulsome review of various factors related to projects, applicants, circumstances, and community needs. As well, Bell Canada's and NPF-PIAC's proposal seems to be designed with access projects in mind, whereas Broadband Fund applicants will be able to submit proposals to build or upgrade access and transport infrastructure for fixed and mobile wireless broadband Internet access services.
59. Further, the Commission is concerned with the possible exclusion of small ISPs or community initiatives under the reverse auction approach. Due to the complexities of setting up and participating in auctions, small applicants may lack the institutional knowledge of the process or may not have access to the necessary resources to meaningfully participate. Moreover, the reverse auction approach could exclude small, remote communities where project costs would be higher than in areas where broadband services closer to the universal service objective are currently being offered.
60. Accordingly, the Commission considers that the reverse auction approach would likely not address its objectives, such as closing the gap in connectivity or facilitating the development of a telecommunications system that serves to safeguard, enrich, and strengthen the social and economic fabric of Canada and its regions. The comparative selection approach, however, would be more advantageous and flexible, since it (i) would allow for the funding of various types of projects, applicants, and communities; and (ii) is more familiar and accessible to most applicants. The Commission considers that reviewing projects based on predefined criteria would enable higher-quality projects to be selected for funding.
61. In light of the above, the Commission determines that a comparative selection approach will be used to evaluate and select projects for funding.

How will projects be evaluated and selected?

Introduction

62. Due to the qualitative nature of the comparative selection approach, it is important that parties have clear details regarding the criteria to be used and the process to be followed in the Commission's evaluation and selection of projects for funding.

63. The Commission will initiate the funding process by publishing a call for applications, along with the application guide and associated forms, as well as maps indicating eligible geographic areas. The call for applications will set out important information for potential applicants in addition to the criteria set out in this decision, including the scope of the call, application deadlines, and any procedural rules.
64. Once the application period has ended, the evaluation and selection of projects for funding will be done in three separate stages, the details for which are set out below.
65. In the first stage, each application will be evaluated according to defined eligibility criteria. To proceed to the next stage, applications will have to meet all of these criteria. Applications that fail to do so will not be considered further.
66. In the second stage, the Commission will assess each eligible project according to an established list of assessment criteria. Some criteria will be common to all projects, while others will be specific to each project type (i.e. access, transport, and/or mobile wireless projects). The purpose of the assessment stage is to identify a subset of overall high-quality projects for the Commission to choose from for funding.
67. In the third stage, the Commission will select projects for funding among the subset of identified high-quality projects. Given the gap in connectivity and the demand for broadband funding, the Commission anticipates that it will receive many applications for funding of high-quality projects, and that the amount of funding requested will exceed available funds. Therefore, the Commission will use specific selection considerations that will enable it to select the projects that best meet the Broadband Fund's objective. The Commission's selection of projects for funding will then be announced.

Eligibility criteria

68. In this section, the Commission will consider the following eligibility issues:⁸
 - Which geographic areas should be eligible?
 - What types of projects should be eligible?
 - What types of applicants should be eligible?
 - Should applicants be required demonstrate that their proposed project is non-viable without Commission funding?
 - Should other government funding be an eligibility criterion?

⁸ This section addresses the eligibility criteria for the main component of the Fund. Specific eligibility criteria for projects covering satellite-dependent communities are addressed in the section entitled "How will projects for satellite-dependent communities be evaluated and selected?"

- Should demonstration of applicant investment be an eligibility criterion?
- Should public sector applicants be required to secure private sector investment?
- What costs should be eligible?
- What costs should be ineligible?
- Should open access be an eligibility criterion?
- Should pricing and affordability be eligibility criteria?
- Should community consultations be an eligibility criterion?

Which geographic areas should be eligible?

Background

69. In Telecom Notice of Consultation 2017-112, the Commission set out a preliminary view that the following criteria are to be used to determine eligible geographic areas for funding (referred to hereafter as eligible geographic areas):

- the area does not meet the fixed or mobile wireless broadband portion of the universal service objective;
- the area is not within a defined proximity (e.g. 2 kilometres) of fibre transport infrastructure, such as the nearest fibre transport PoP; and
- other factors indicate that market forces or funding from other public entities cannot reasonably be expected to deliver service to the area meeting the universal service objective without the support of the Commission’s Broadband Fund.

70. The Commission did not define what would constitute a “geographic area”; however, it stated that it could follow the example of ISED, in which geospatial data is mapped out in hexagonal units of 25 square kilometres (km²). The Commission also raised the issue of whether, when a geographic area is deemed ineligible for funding, an applicant should be given the opportunity to make a case for the Commission to consider the area to be eligible.

Positions of parties

71. Bell Canada, CNOC, the Eastern Ontario Warden’s Caucus and Eastern Ontario Regional Network (collectively, EOWC-EORN), NPF-PIAC, RCCI, SaskTel, Shaw, and SSi, as well as the majority of the provincial, territorial, regional, and municipal governments, supported the use of 25 km² hexagons for identifying eligible geographic areas. These parties indicated that the 25 km² hexagons are a relevant scale to represent the broadband Internet access services available in most communities.

72. Several parties, such as Blue Sky Economic Growth Corporation (Blue Sky), the Canadian Association of Wireless Internet Service Providers (CANWISP), Cogeco, and Cybera, as well as the Government of Alberta, were opposed to using 25 km² hexagons since they would not be granular enough and would not properly reflect the reality of available broadband Internet access services. These parties argued that the 25 km² hexagon method involves combining data from different sources and does not account for areas with partial service. Cogeco and the Columbia Basin Broadband Corporation (CBBC) proposed letting the applicants themselves define the eligible geographic areas for which they are requesting funding, rather than imposing standard geographic areas.
73. Parties did not agree on how the Commission should define an underserved area for the purpose of funding fixed broadband Internet access service projects. Consumer groups such as NPF-PIAC and l'Union des consommateurs, as well as governments such as those of Nunavut and Yukon, submitted that since the universal service objective includes a number of criteria, geographic areas should remain eligible for funding until all the universal service objective criteria are met to ensure that services to consumers continue to improve.
74. The Alberta Association of Municipal Districts and Counties (AAMDC), Cogeco, and RCCI, as well as the Government of Alberta, supported the use of a 50 Mbps download speed proxy to determine if a geographic area is eligible for funding.
75. Many parties, including most incumbent local exchange carriers (ILECs), many ISPs, and all levels of government, opposed the Commission's preliminary view on PoP proximity. These parties provided multiple examples of geographic areas located near a PoP or a transport network that are still underserved, and submitted that market forces would likely never bring improved broadband Internet access service to these areas. Other parties, such as DERYtelecom and the Government of British Columbia, argued that demographic or topographic constraints can prevent market forces from resulting in investment in broadband Internet access networks due to high costs and lack of a business case.
76. RCCI and Shaw supported the Commission's preliminary view on PoP proximity. They maintained that market forces would result in the availability of broadband Internet access service in areas close to a fibre transport PoP. RCCI suggested that the Commission consider geographic areas within 10 km of a fibre transport network as ineligible for funding.
77. The Nunavut Economic Forum Coalition (NEFC) suggested that the Commission use the definitions provided by ISED for its CTI program to identify remote communities that could be eligible for transport project funding. In the CTI Application Guide, ISED defined an eligible rural community as a named place⁹ with a population of fewer than 30,000 residents that is 2 km or more from the nearest PoP with a capacity of 1 gigabit per second (Gbps). ISED defined eligible remote communities as rural communities that do not have year-round access to roads and/or that are included on the Commission's list of communities dependent on satellite for telecommunications services.

⁹ Specifically, the CTI Application Guide states: "CTI will draw on the Geographic Names Board of Canada's database of named places and Statistics Canada population data to highlight eligible communities."

78. Only a few parties commented on how to identify underserved geographic areas for potential mobile wireless service projects to be funded. The Government of Yukon indicated that eligible projects must cover major transportation roads where long-term evolution (LTE) technology is not available, and supported the Commission's definition of eligible roads set out in Telecom Regulatory Policy 2016-496.
79. Some parties, such as the Federation of Canadian Municipalities (FCM), SaskTel, Shaw, and SWIFT, as well as the Government of Alberta, agreed that applicants in geographic areas deemed ineligible for Commission funding (referred to hereafter as ineligible geographic areas) should be able to use evidence such as speed tests and service metrics to prove that such areas are eligible for funding. Generally, these parties considered this to be a more flexible approach, which could address areas deemed ineligible due to errors in broadband availability data or due to being partially served.
80. Other parties opposed providing an opportunity to challenge ineligible geographic areas. Both Bell Canada and RCCI considered that such an opportunity would result in a diversion of funds that would deprive areas in greater need of broadband funding. CNOC pointed out that although a challenge opportunity would add some flexibility to the Broadband Fund's management, it would weaken eligibility criteria and result in an increased number of complex cases to be processed.

Definition of eligible geographic areas – Commission's analysis and determinations

81. The Commission considers that use of a standard method to define eligible geographic areas for funding would efficiently identify and communicate these areas to applicants. It would also provide an effective way to identify projects covering the same eligible geographic area. The Commission therefore considers that it would not be appropriate to allow applicants to define the geographic area for proposed projects.
82. The Commission used hexagons to depict geographic areas during the proceeding that led to Telecom Regulatory Policy 2016-496. In addition, ISED used the hexagon method to define eligible geographic areas for its CTI program. ISED has also developed detailed data related to each hexagon that the Commission can leverage in developing its own broadband maps. Since industry members and other potential applicants are already familiar with the use of hexagons for delineating geographic areas, the Commission considers that the use of hexagons to define eligible geographic areas would reduce the administrative burden on applicants and would facilitate the Broadband Fund's management. Accordingly, the Commission considers the use of 25 km² hexagons to define eligible geographic areas to be appropriate.
83. In light of the above, the Commission determines that for the purpose of the Broadband Fund, 25 km² hexagons will be used to define eligible geographic areas on maps to be provided by the Commission in conjunction with its call for applications. The Commission also determines that a hexagon will be identified on the Commission's eligibility maps when at least one household is present within its bounds.

Eligible geographic areas for fixed broadband Internet access service projects – Commission’s analysis and determinations

84. In its preliminary view set out in Telecom Notice of Consultation 2017-112, the Commission proposed to use the download speed for the fixed broadband Internet access service portion of the universal service objective (50 Mbps) as a proxy to determine if a geographic area is considered to be “served.” All geographic areas that do not meet this minimum requirement would be deemed as “underserved” and therefore eligible for funding.
85. The Commission considers, however, that along with download speed, upload speed should be considered in a proxy for “served” geographic areas, since it may help identify areas that lack capacity and that may require network upgrades to provide universal service objective-level broadband Internet access service. Consequently, the Commission considers that, for the purpose of the Broadband Fund, an underserved household is a household that does not have access to broadband Internet access service at universal service objective-level download and upload speeds. If one household within a hexagon is deemed to be served, it is likely that market forces will bring improved levels of broadband Internet access service to the remaining households in the hexagon. The Commission therefore considers that all households in a hexagon must be underserved for that hexagon to be deemed underserved and thus eligible for funding.
86. The Commission considers that there would be little benefit to including an unlimited data option and quality of service metrics, as established in the universal service objective, as minimum requirements to identify eligible geographic areas. The Commission is of the view that geographic areas that do not have access to broadband Internet access service at 50 Mbps would likely also not have access to unlimited data and broadband services that meet the quality of service metrics.
87. In light of the above, the Commission determines that to be eligible for funding for a fixed broadband Internet access service project, an applicant must propose to build or upgrade infrastructure in an eligible geographic area, defined as a 25 km² hexagon where there is at least one household, as per Statistics Canada’s latest census data, but where no household has access to broadband Internet access service at universal service objective-level download and upload speeds (i.e. 50/10 Mbps).

Eligible geographic areas for transport projects – Commission’s analysis and determinations

88. According to the Commission’s preliminary view set out in Telecom Notice of Consultation 2017-112, areas within a defined proximity of fibre transport infrastructure, such as the nearest PoP, would be ineligible for funding. This was based on an expectation that a community close to a PoP would likely become connected through market forces. The Commission has considered RCCI’s submission that areas within 10 km of a PoP should be considered ineligible for transport project funding. However, the Commission is of the view that substantial investment is needed to build or upgrade transport networks to connect to a PoP that is up to 10 km away, which would exclude many underserved geographic areas from being eligible for funding. As noted in its preliminary view, the Commission considers that a distance of 2 km or less from a PoP is more appropriate to identify areas that are likely to be connected through market forces.

89. The capacity available at a PoP on a transport network providing service in a particular geographic area affects the level of broadband Internet access service that can be offered. The Commission considers that geographic areas where there is a PoP with a minimum capacity of 1 Gbps can be considered served. Geographic areas where there is a PoP with a capacity of less than 1 Gbps, however, will likely not have the capacity to provide service to a nearby underserved community. Accordingly, the Commission finds that underserved areas are areas that are located 2 km or more from a PoP with a minimum capacity of 1 Gbps.
90. Since the purpose of a transport project is to connect communities, the Commission considers that for transport projects, eligible geographic areas must include an eligible community, which the Commission defines as a small population centre with a population of fewer than 30,000 residents.
91. In light of the above, the Commission determines that to be eligible for funding for a transport project, an applicant must propose to build or upgrade infrastructure to an eligible community, defined as a small population centre with a population of fewer than 30,000 residents, that is located at least 2 km away from a PoP with a minimum capacity of 1 Gbps.

Eligible geographic areas for mobile wireless service projects – Commission’s analysis and determinations

92. In Telecom Regulatory Policy 2016-496, the Commission stated that the latest generally deployed mobile wireless technology (currently LTE) should be available not only in Canadian homes and businesses, but on as many major transportation roads as possible in Canada. The Commission stated that major transportation roads include key interprovincial and international corridor roads, key linkages to these roads from population and economic centres, and key linkages from major roads that provide the primary means of access to northern and remote areas.
93. The Commission considers that it should define what constitutes a major transportation road. Statistics Canada maintains a [Road Network File](#) containing a ranking system for different categories of transportation roads. The Commission uses this system to map out mobile wireless technology coverage of populated areas and roads in Canada for the purpose of its *Communications Monitoring Report*. The Commission considers that Statistics Canada’s street rank codes 1 through 3 correspond to the Commission’s definition of major transportation roads stated above. Accordingly, the Commission determines that for the purpose of the Broadband Fund, a major transportation road is a road classified by Statistics Canada as having a street rank code of 1, 2, or 3.
94. In light of the above, the Commission determines that to be eligible for funding for a mobile wireless service project, an applicant must propose to build or upgrade infrastructure in an eligible geographic area defined as either
 - a 25 km² hexagon in which Statistics Canada’s latest census data shows that there is at least one household but no access to coverage by the latest generally deployed mobile wireless technology (currently LTE), or

- part of a major transportation road that does not have access to coverage by the latest generally deployed mobile wireless technology (currently LTE).

Opportunity to challenge ineligible geographic areas – Commission’s analysis and determinations

95. For the purpose of the Broadband Fund, a hexagon will be considered served, and therefore ineligible for funding, if one or more households within that hexagon have access to universal service objective-level fixed or mobile wireless broadband Internet access service, depending on the type of project proposed, as described above. Consequently, partially served areas will not be eligible for funding. The Commission has examined whether it should consider applications for funding for ineligible geographic areas, along with evidence demonstrating why they should be eligible, and considers that it is likely that market forces will bring improved levels of service to ineligible geographic areas.
96. Accordingly, the Commission determines that only proposed projects that would serve the eligible geographic areas outlined above will be considered for funding, and the Commission will not incorporate a challenge mechanism for ineligible geographic areas.

What types of projects should be eligible?

Background

97. In Telecom Regulatory Policy 2016-496, the Commission stated that applicants will be able to submit funding proposals to build or upgrade access and transport infrastructure for fixed and mobile wireless broadband Internet access service. While the Commission did not specify minimum levels of service for proposed projects, it indicated that in some underserved areas, achieving the universal service objective will likely need to be accomplished in incremental steps.

Positions of parties

98. EOWC-EORN submitted that applicants that do not commit to providing 50/10 Mbps service as an aspirational goal should not be eligible for funding. The FMCC and NPF-PIAC submitted that the Commission should generally require that projects meet the 50/10 Mbps universal service objective speed requirement. NPF-PIAC added that a transparent approach would be for the Commission to designate service characteristics as project eligibility criteria.
99. The Government of Nova Scotia indicated that the Commission should consider technology limitations in remote areas in determining speed requirements. NPF-PIAC noted that the speed requirement of 50/10 Mbps could be modified for areas where population dispersion makes fixed wireless service the only viable option to provide broadband service. The FMCC and SSi submitted that the Commission should take into account oversubscription and capacity limitations in Northern and Indigenous communities.

Introduction – Commission’s analysis and determinations

100. The Commission reiterates that projects to build or upgrade fixed access infrastructure, transport infrastructure, mobile wireless infrastructure, or any combination of these, that meet the eligibility criteria will be further evaluated against the assessment criteria. Projects

involving a combination must meet the eligibility criteria for each type of project included, as set out below.

Fixed broadband Internet access service projects – Commission’s analysis and determinations

101. The universal service objective established in Telecom Regulatory Policy 2016-496 sets out aspirational targets for download and upload speeds, as well as capacity. In Telecom Decision 2018-241, the Commission also established aspirational targets for two quality of service metrics: latency and packet loss. The Commission also initiated Telecom Notice of Consultation 2018-242 to establish an appropriate quality of service metric for jitter. The Commission considers that instead of using speed, capacity, and quality of service to determine whether projects are eligible for funding, using only speed is sufficient for the eligibility stage.
102. In Telecom Regulatory Policy 2016-496, the Commission indicated that the universal service objective will likely need to be accomplished in incremental steps due to many factors, such as geography, the cost of transport capacity, the distance to PoPs, and the technology used. The use of 50/10 Mbps as the speed eligibility criterion to be delivered by fixed broadband Internet access service projects would therefore disadvantage some underserved areas.
103. Nevertheless, the Commission considers that setting a minimum speed eligibility criterion for fixed broadband Internet access service projects would be helpful. Eligible projects must enable consumers to participate effectively in the digital economy. According to the Commission’s 2017 *Communications Monitoring Report*, up to 2013, over two thirds of Canadians subscribed to a download service speed of 15 Mbps or less. Since 2013, there has been a notable shift in Canadians’ subscription rates for higher-speed services. Data from the same report indicates that in 2016, 53.9% of Canadians subscribed to service speeds of 25 Mbps or higher.
104. The universal service objective includes both download and upload speed criteria. A speed eligibility criterion of 25 Mbps download and 5 Mbps upload would likely result in projects covering underserved areas that would deliver a broadband Internet access service that the majority of Canadians use today. Accordingly, the Commission considers that a minimum speed eligibility criterion of 25 Mbps download and 5 Mbps upload would be meaningful and a significant first step towards meeting the universal service objective. These speeds are to be the actual speeds delivered, not merely those advertised.
105. In light of the above, the Commission determines that to be eligible for funding, proposed projects that would build or upgrade access infrastructure must be capable of providing a minimum download speed of 25 Mbps and a minimum upload speed of 5 Mbps.
106. However, the Commission expects that proposed projects that do not meet the universal service objective-level speeds of 50 Mbps download and 10 Mbps upload will be scalable, meaning that speeds of 50/10 Mbps will be provided to the target community at a future date through capacity upgrades in the access or transport infrastructure. The Commission will evaluate the scalability of each proposed fixed broadband Internet access service project in the assessment stage.

Transport projects – Commission’s analysis and determinations

107. Parties did not provide specific views on the minimum capacity that should be required for transport projects. The Commission considers that a minimum transport capacity requirement should be established so that proposed transport projects to be considered for funding would meaningfully contribute to the objective of the Broadband Fund. For proposed projects to build new infrastructure, establishing a minimum transport capacity of higher than 1 Gbps could disadvantage certain underserved areas where the only feasible transport technology may be microwave technology that may not support capacity higher than 1 Gbps. However, for proposed projects to upgrade existing transport infrastructure, it would be appropriate to set a higher minimum transport capacity requirement of 10 Gbps. The Commission considers that where transport facilities exist, it is appropriate to expect a funded project to upgrade the transport infrastructure to support the speed and capacity levels set out in the universal service objective.
108. Accordingly, the Commission determines that to be eligible for funding, proposed transport projects for new builds must offer a minimum capacity of 1 Gbps, and proposed projects that would upgrade transport infrastructure must offer a minimum capacity of 10 Gbps. If a proposed transport project contains transport links to new interconnection points and transport links that upgrade existing interconnection points, each new interconnection point must meet the 1 Gbps minimum capacity requirement and each interconnection point being upgraded must meet the 10 Gbps capacity requirement.

Mobile wireless service projects – Commission’s analysis and determinations

109. The Commission considers that as set out in the universal service objective, the deployment of the latest mobile wireless technology is a sufficient eligibility criterion for mobile wireless service projects. The Commission determines that only proposed projects that use at a minimum the latest generally deployed mobile wireless technology, currently LTE, will be eligible for funding.

What types of applicants should be eligible?

Background

110. In Telecom Regulatory Policy 2016-496, the Commission stated its preliminary view that eligible recipients of funding from the Broadband Fund would be required to meet the following criteria:
- be legal entities, incorporated in Canada, that already operate or intend to operate broadband infrastructure. These include private sector companies; provincial, territorial, regional, municipal, and First Nations entities; and non-profit organizations. Individuals and federal entities (including Crown corporations) are not eligible.
 - demonstrate experience in deploying and operating broadband infrastructure. If the entity does not itself have a track record in operating broadband infrastructure, it must demonstrate that it has appropriate resources with experience deploying and operating broadband infrastructure as part of its project team or contractual resources.

- demonstrate solvency and reliability through supporting documentation.

Positions of parties

111. Parties including Bell Canada, Blue Sky, the CBBC, CNOC, Eastlink, SSi, and TCI generally agreed with the Commission's preliminary view on eligible recipients. Other parties suggested various additional eligibility requirements. For example, DERYtelecom proposed that applicants should demonstrate a minimum of five years' experience in operating a telecommunications network, while the BCBA suggested that applicants should demonstrate the successful completion of publicly funded projects.

112. Parties also provided their views on entities that should be ineligible for funding. RCCI submitted that ILECs should not be able to "double dip" in both the local service subsidy and the Broadband Fund in the same geographic area. OpenMedia proposed that incumbent ISPs should not be eligible for funding. TCI strongly opposed these proposals, arguing that the preclusion or favouring of certain applicants is neither competitively nor technologically neutral and would not result in the most efficient funding process.

113. Cybera and OpenMedia argued that the Commission should prioritize non-profit organizations, municipalities, co-operatives, First Nations members, and community networks. EOWC-EORN suggested that funds be distributed through public-private partnerships with local governments or intermediaries, which would then direct the funds to companies that are already addressing service quality and affordability gaps across the country.

114. Many parties discussed the merits of public-private partnerships. The BCBA, DERYtelecom, EOWC-EORN, the FMCC, Galaxy Broadband Communications Inc. (Galaxy), NPF-PIAC, Shaw, and SWIFT, as well as the governments of Nunavut, Ontario, and Yukon, supported the eligibility of public-private partnerships, enabling organizations without experience to partner with organizations that have experience.

Commission's analysis and determinations

115. The Commission considers that the Broadband Fund should be competitively neutral and not prioritize any particular applicants. However, the Commission considers it important to ensure that Broadband Fund recipients have experience in deploying broadband infrastructure and operating networks, which parties supported. The Commission considers that a requirement of five years of experience, as proposed by DERYtelecom, may prevent some newer entrants from applying for funding and that a requirement of three years of experience would be more appropriate, since it would provide an opportunity for various types of applicants to apply for funding.

116. The Commission also considers it important to ensure that funding recipients are financially solvent and reliable, and that projects meet community members' needs.

117. Although eligible applicants can be public-private partnerships, the Commission considers it of fundamental importance that it retain the responsibility and discretion to ensure that funds for broadband service projects are distributed in an appropriate and fair manner, consistent

with the telecommunications policy objectives in the *Telecommunications Act*, to ensure continuing access by Canadians to basic telecommunications services. The Commission therefore considers that providing funding to local governments or intermediary organizations and allowing them to decide how and where funds are to be distributed would not be an appropriate model for managing the Broadband Fund.

118. With respect to RCCI's proposal that applicants not be able to draw funds from both the local service subsidy and the Broadband Fund in the same geographic area, the Commission does not consider this to be an issue, since the local service subsidy is being phased out.

119. In light of the above, the Commission determines that to be eligible for funding, applicants must demonstrate that

- they are one of the following:
 - (a) a corporation, either for-profit or not-for-profit, incorporated under the laws of Canada, a Canadian province, or a Canadian territory;
 - (b) a Canadian provincial, territorial, or municipal entity, including a public-sector body that is established by statute or by regulation or that is wholly owned by a Canadian provincial, territorial, or municipal government;
 - (c) a band council within the meaning of section 2 of the *Indian Act*, or an Indigenous (First Nations, Inuit, or Métis) government as established by a self-government agreement or a comprehensive land claim agreement; and/or
 - (d) a partnership, joint venture, or consortium that is composed of the parties identified in (a), (b), and/or (c) above.
- they, or at least one member of the applicant partnership, joint venture, or consortium, are eligible to operate as a Canadian carrier pursuant to section 16 of the *Telecommunications Act*.
- they, or each member of the applicant partnership, joint venture, or consortium, with the exception of applicants that are members of (b) above, are financially solvent and reliable by providing independently prepared financial statements for the last three years.
- they, or at least one member of the applicant partnership, joint venture, or consortium, have experience deploying and operating broadband infrastructure in Canada for a minimum of three years, or they have entered into a contractual arrangement with an entity as described in (a), (b), and/or (c) above that has experience deploying and operating broadband infrastructure in Canada for a minimum of three years.

120. Individuals, as well as federal departments, agencies, boards, commissions, Crown corporations, and special operating agencies, are ineligible for funding from the Broadband Fund as applicants or as a member of an applicant partnership, joint venture, or consortium.

Should applicants be required to demonstrate that their proposed project is non-viable without Commission funding?

Background

121. In Telecom Regulatory Policy 2016-496, the Commission determined that applicants would need to demonstrate that the proposed project would not be viable without Commission funding.

Positions of parties

122. Parties generally supported the requirement to demonstrate that a project would not be viable without Commission funding.

123. Parties including the AAMDC, the CBBC, the Eeyou Communications Network (Eeyou), EOWC-EORN, the FMCC, Galaxy, SWIFT, TBayTel, and TCI, as well as the governments of Nova Scotia, Nunavut, and Ontario, and the KRG, suggested that applicants provide documentation to show that their proposed projects would not be viable without Commission funding, such as a business case, cost studies, or anticipated operational costs and revenues based on established accounting principles.

124. A few parties, including the CCSA-ITPA and SSi, submitted that non-viability without Commission funding should not be a strict eligibility criterion, but rather an assessment criterion. OpenMedia suggested that there should be customized standards for different types of projects.

125. The BCBA, Bell Canada, CANWISP, the CCSA-ITPA, and Shaw argued that a non-viability criterion is unnecessary, since the fact that certain areas remain underserved despite several funding initiatives at various levels of government demonstrates that extending service to those areas is economically unviable. Similarly, Blue Sky and CNOC argued that the other eligibility criteria are sufficient to screen out otherwise-viable projects.

Commission's analysis and determinations

126. A requirement for applicants to demonstrate that a project is not viable without Commission funding aligns with the Commission's policy objective to rely on market forces to the maximum extent feasible. If otherwise-viable projects were eligible for Commission funding, this could result in (i) funds being diverted from communities that are most in need to communities where projects could be completed using existing resources, or (ii) other funding entities reducing their investments in already-viable projects, which is contrary to the Commission's goals of complementing the existing ecosystem for broadband funding and encouraging continued investment in broadband infrastructure.

127. A lack of existing broadband infrastructure that meets the universal service objective in a certain area may indicate that there is a lack of a business case for that area. There have been several broadband funding initiatives across Canada in the last few years, and areas that remain underserved are likely those that present some of the highest costs to serve and the least likelihood to be served by market forces alone. However, these initiatives focused on a lower level of broadband service than the level set out in the universal service objective.

Therefore, the use of such initiatives would be an inappropriate proxy for determining areas where funding is needed to achieve the universal service objective.

128. The Commission considers that (i) a requirement for applicants to demonstrate that a project is not viable without Commission funding is appropriate, and (ii) it should set a standard to ensure that applications are assessed using the same information. Accordingly, applicants will be required to demonstrate that their project would not be viable without Commission funding using standard forms that the Commission will provide according to project type (i.e. transport, access, transport and access, or mobile wireless). In particular, they must indicate expected costs and projected revenues.

129. In light of the above, the Commission determines that to be eligible for funding, applicants must demonstrate, by filing standardized financial projections, that without Commission funding, their proposed project would not be viable.

Should other government funding be an eligibility criterion?

Background

130. In Telecom Regulatory Policy 2016-496, the Commission made the determination that to be eligible for the Broadband Fund, applicants would be required to secure a minimum level of financial support from a government entity, which must be more than a nominal amount and must be commensurate with the nature of the project. Further, the Commission determined that applications with greater levels of government funding would be given more weight in the evaluation process. These determinations were made in recognition that the universal service objective can be met only with the help of other stakeholders in the Canadian telecommunications landscape, and that the Broadband Fund is intended to evolve within the broadband Internet funding ecosystem, complementing, not replacing, other sources of funding and investment.

Positions of parties

131. Most parties questioned the government funding requirement, with some noting that the issue was not canvassed in the proceeding leading to Telecom Regulatory Policy 2016-496. Bell Canada, NPF-PIAC, TCI, Videotron, and Xplornet argued that the requirement puts low-cost and privately funded proposed projects that would otherwise be eligible for funding at risk of being rejected. Bell Canada further argued that the requirement puts the evaluation process at risk of being politicized at the eligibility stage and some applicants at risk of being disadvantaged. CNOC argued that the requirement could favour ILECs, due to their better ability to secure funding, and could be onerous for smaller service providers.

132. Many municipalities expressed concern that the government funding requirement may exclude their communities from the Broadband Fund due to their limited finances. Parties expressed similar concerns regarding the challenges of aligning the timing of available government funds with that of the Commission's Broadband Fund. For example, Eastlink noted that coordination is already an issue, since several provincial and territorial governments have announced funding programs that are likely to be concluded before the Commission starts to distribute funding from the Broadband Fund, which could result in

proposed projects in these provinces and territories being denied funding from the Commission. The Government of British Columbia noted that not all entities identified by the Commission in Telecom Regulatory Policy 2016-496 have the legal powers or financial resources to provide funding.

133. Cogeco and NPF-PIAC raised the alleged inconsistency that applicants would have to show that a project is not viable without Commission funding and that they have government funding for that non-viable project.
134. Bell Canada and Cogeco raised the concerns that (i) governments may have different deployment requirements and timelines, (ii) governments could provide funding based on factors that are irrelevant or even contrary to the *Telecommunications Act*, and (iii) it would be difficult for multiple decision makers using disparate criteria to decide on funding the same project.
135. Only a few parties supported the requirement for government funding. OpenMedia supported this requirement, citing the section 7 policy objectives of the *Telecommunications Act*, as well as possibilities for community engagement. However, OpenMedia argued that the requirement should be applied on a case-by-case basis in light of the concerns parties raised regarding the barriers that the requirement may impose on small companies. Parties such as the BCBA and SWIFT submitted that without the requirement for government funding, there is little incentive for private operators to work with local organizations to meet local needs. SWIFT noted the concern that not requiring this collaboration would pose a significant risk to the continued success of certain broadband service projects.

Commission's analysis and determinations

136. While the question of the requirement for government funding was not raised as an issue in Telecom Notice of Consultation 2017-112, many parties argued that this should not be an eligibility requirement.
137. The Commission set out the government funding requirement in Telecom Regulatory Policy 2016-496 because it was of the view that closing the gap in connectivity requires investment from all stakeholders in the Canadian telecommunications landscape. However, since the publication of that decision, many different government broadband funding initiatives have been announced. It is possible that by the time applicants seek project funding from other governments for the purpose of the Broadband Fund, these governments may be unable to provide funds to support those projects, since their current budgets for broadband infrastructure projects may have already been expended.
138. Further, since some municipalities may be unable to provide financial support for broadband projects, certain regions could be excluded from Commission funding simply because their local government lacks broadband funding at the time of the Commission's call for applications. Also, other government programs may have funding criteria that could either not coincide with the Commission's criteria, or conflict with the Policy Direction or the *Telecommunications Act*.

139. Given the above-noted change in circumstances and considerations, the Commission determines that applicants will not be required to secure a minimum level of financial support from a government entity to be eligible for funding.
140. Nevertheless, given the size of the remaining gap in connectivity and the importance of broadband services for all Canadians, the Commission's view that there needs to be a collective effort from all levels of government to achieve the goal of all Canadians having access to universal service objective-level broadband services has not changed since the issuance of Telecom Regulatory Policy 2016-496. To that end, the Commission will continue to monitor other governments' broadband funding initiatives to ensure that the responsibility to develop broadband services remains shared. In addition, to ensure that the Broadband Fund operates as efficiently as possible, without excluding projects in areas where no other government funding is available, the Commission will take into account funding from other governments at the assessment stage. Applicants must indicate whether they have applied for other ongoing funds for which decisions might not have been published yet.
141. Although very few parties supported the requirement for government funding, those that did support it submitted that it would favour community engagement and incent private operators to work with local organizations. The Commission considers that this kind of interaction between communities and service providers is important and can lead to better, more efficient broadband projects for Canadians. The Commission has therefore established community consultations as an eligibility criterion, as discussed in paragraphs 216 to 224 below.

Should demonstration of applicant investment be an eligibility criterion?

Background

142. In Telecom Regulatory Policy 2016-496, the Commission determined that applicants would be required to provide a minimum amount of investment in their project. The Commission stated that this amount must be more than a nominal amount and must be commensurate with the nature of the project. In Telecom Notice of Consultation 2017-112, the Commission stated the preliminary view that a public sector entity applying for funding would meet the applicant investment requirement if it invests in the project itself, without requiring any private sector investment.

Definition of terms – Positions of parties

143. Parties' submissions widely differed on whether the Commission should set a minimum applicant investment threshold and, if so, what that threshold should be. As well, parties were generally opposed to defining the terms "nominal" and "commensurate."
144. The BCBA and CANWISP proposed that applicants should provide a minimum of 10% of the project costs. DERYtelecom opposed implementing an investment floor but, in the alternative, it proposed implementing a range of 20 to 30% investment. The CCSA-ITPA and CNOC argued that there should be no predefined minimum investment criterion, since this could automatically exclude projects from small, independent operators. OpenMedia submitted that the minimum investment threshold for national dominant ISPs should be different than the threshold for small local community ISPs.

145. Bell Canada, CANWISP, the CBBC, Shaw, and SSi opposed defining the terms in advance. RCCI argued that although applicant investment should be commensurate with the nature of the project, the appropriate amount of investment will vary depending on the remoteness and costs of the project. Many parties suggested that applicant investment should be evaluated at the assessment stage, such that the larger the applicant's investment in the project, the better it should be considered.

Definition of terms – Commission's analysis and determinations

146. The Commission recognizes that defining the terms "nominal" and "commensurate" would ensure that applicants know the specific amount of investment required, and would create a consistent standard that applies to all applicants. Based on the record of the proceeding, however, it would be difficult to determine a standard that would work for various types of projects. As noted by parties, the level of funding that is appropriate for one project may not be appropriate for another. The Commission considers that it would be best not to specify the amounts of investment required by applicants in order to retain the flexibility to consider the level of investment in the context of the particular project.

147. In light of the above, the Commission confirms that to be eligible for funding, applicants must specify the amount of investment in their project that is more than a nominal amount given the nature of the project. The Commission determines that the level of the applicant's investment will be further evaluated as an assessment criterion.

Demonstration of capacity to fund investment – Positions of parties

148. Parties generally supported a requirement for applicants to provide documented proof of their ability to fund proposed projects, but differed in their suggestions of what documentation should be required.

149. Eastlink submitted that established carriers should be required to provide a comfort letter from their financial institution confirming that they are in good credit standing and have access to capital, while small providers that have little to no experience may require additional evidence, such as a bond.

150. Bell Canada proposed that applicants should demonstrate their ability to fund proposed projects through an irrevocable standby letter of credit payable to the Receiver General for Canada, drawn on a financial institution that is a member of Chartered Professional Accountants Canada, which would cover the full cost of the proposed project. However, CANWISP, the CBBC, and Xplornet argued that a letter of credit may not be possible or practical since small businesses may lack the resources to obtain one.

151. The BCBA, RCCI, Shaw, SSi, and TBayTel, as well as the Government of Quebec, supported the provision of copies of registration and other relevant documents and independently prepared financial statements, as well as a balance sheet, for the previous three years. Provincial and territorial governments, including those of Nova Scotia, Nunavut, Ontario, and Yukon, generally suggested that applicants should be required to show their capacity to fund proposed projects through financial statements.

152. Conversely, One Nation Networks, a Division of WiBand Communications Corp. (ONN), submitted that if applicants can secure funding for their proposed project and have a plan in place to ensure the operation of the network for a minimum of five years, they should not have to provide three years of financial statements.

Demonstration of capacity to fund investment – Commission’s analysis and determinations

153. Parties generally supported the provision of financial documents that are verified by a third party and the requirement for applicants to demonstrate some history of stability and ability to provide broadband services. The Commission considers that a requirement for independently prepared financial statements (including audited, review engagement, or notice to reader) for applicants that are not provincial, territorial, or municipal government entities will strike the appropriate balance between ensuring that documents are accurate and that they are not overly burdensome on applicants.

154. The Commission recognizes that requirements that are too onerous may preclude small applicants from being able to apply for funding from the Broadband Fund. However, it is important for the Commission to be satisfied that an applicant has the resources necessary to complete the proposed project. Accordingly, parties relying on credit to finance their proposed projects must provide documentation demonstrating irrevocable credit equal to the sum they will be required to pay to complete the project.

155. In light of the above, the Commission confirms that to be eligible for funding, an applicant must demonstrate its ability to fund its own investment in the proposed project, as follows, with further details to be provided in the application guide:

- An applicant that is not a provincial, territorial, or municipal government entity is required to file independently prepared financial statements for the last three years.
- If an applicant is a partnership, joint venture, or consortium, the applicant is required to file financial statements as set out above for each member or partner that is not a provincial, territorial, or municipal government entity.
- An applicant relying on credit to demonstrate its ability to fund its project must provide documentation from a third-party lender or investor indicating that it has irrevocable access to the credit required to pay for the project.

Should public sector applicants be required to secure private sector investment?

Positions of parties

156. Parties were divided on whether public sector entities should be eligible for funding on their own. The CCSA-ITPA argued that public sector entities should not be eligible on their own, since they typically receive funding from tax revenues. As well, since telecommunications service providers will contribute to the Broadband Fund, the provision of these funds to public sector entities would be a misappropriation of private funds. Similarly, the NEFC and SSi urged the Commission to consider public sector entities only as a last resort if no other

private company with expertise in remote communities is interested in delivering broadband services.

157. NPF-PIAC and OpenMedia, as well as the Government of British Columbia, agreed with the Commission's preliminary view that a public sector entity that is an applicant and invests in its own project can be deemed to have secured both public and private sector funding.

Commission's analysis and determinations

158. Parties were divided regarding the Commission's preliminary view that a public sector applicant would not be required to secure private sector investment. With respect to the concerns raised by the CCSA-ITPA, an entity must have experience deploying and operating broadband networks to be eligible for funding. Consequently, a public sector entity would need to either be an existing carrier with three years of experience in the deployment and operation of broadband networks, or partner with another entity that has that experience. Further, the Commission considers that given that the objective of the Broadband Fund is to expand the availability of broadband services, it should support any willing service providers, whether public or private.

159. Similarly, the Commission considers that public-private partnerships would fulfill the Commission's goal of all levels of government and the industry working together to achieve the universal service objective. However, public and private funding will be considered at the assessment stage. Since the Commission is not requiring private sector applicants to obtain other government funding, it would be consistent for the Commission not to require that public sector entities secure private sector funding. The Commission therefore sees no compelling reason to deviate from its preliminary view set out in Telecom Notice of Consultation 2017-112 on public sector applicant investment, and confirms that a public sector entity is not required to secure private sector investment as an eligibility criterion.

What costs should be eligible?

Background

160. In Telecom Notice of Consultation 2017-112, the Commission presented its preliminary view on what would constitute eligible costs under the main component of the Broadband Fund, as follows:

Eligible costs will include costs associated with activities such as engineering and design, environmental scans and assessments, as well as the purchase and installation of equipment and infrastructure (including the provisioning of backhaul capacity and other one-time access-driven costs).

These eligible costs will include, for example,

- equipment costs, including the costs of servers, switching and transmission equipment, fibre-optic cable, repeaters, radio and microwave equipment, towers, poles, shelters and enclosures, backup power supplies, and network broadband connectivity devices including upgrades and adaptations;

- material costs associated with the set-up and performance of the proposed project;
- labour costs, including the one-time costs associated with the engineering and installation of capital equipment, network deployment, and service provisioning;
- labour-related travel costs, such as those associated with engineering, installation, network deployment, and service provisioning, considered on a case-by-case basis; and
- other direct costs associated with the project start-up.

Positions of parties

161. Parties including the AAMDC, the CBBC, EOWC-EORN, RCCI, SaskTel, and TCI generally agreed with the Commission’s preliminary view regarding eligible costs.

162. Other parties, such as OpenMedia and SSi, recommended a more expansive list of eligible costs. OpenMedia argued that eligible costs should be flexible and determined in consultation with local communities on a community-by-community basis. The CBBC suggested including a catch-all clause, such as “other expenditures that are not otherwise listed herein and that may be approved for payment from time to time,” to enable the consideration of some costs that may not be explicitly eligible or that do not clearly fall under one of the eligibility criteria. CNOC opposed expanding the list of eligible costs provided in the Commission’s preliminary view, submitting that eligible costs should be costs that are necessary to the actual deployment of broadband infrastructure.

163. SWIFT argued that the Commission’s preliminary view included too many types of assets with a short lifespan.

164. The CCSA-ITPA and Eastlink argued that the portion of costs incurred for overbuilding¹⁰ competitors should generally not be eligible. The CCSA-ITPA submitted that although in some cases an overbuild would be the most effective use of funds, this should be the exception and not the rule. Eastlink argued that in cases where only a portion of a certain costs element is intended to serve the underserved community, the remaining costs, including excess capacity, should not be included.

Commission’s analysis and determinations

165. The Commission considers that only the costs that are directly related to the proposed project and its required capacity should be covered by the Broadband Fund. Consequently, costs for excess capacity that are not required for the project’s implementation will not be eligible,

¹⁰ Overbuilding refers to building a new broadband network in an area where a broadband network already exists.

since those costs are not directly related to the project. Likewise, costs for portions of the project covering areas that are not considered underserved will not be eligible.

166. The Commission considers that eligible costs should not be considered on a project-by-project basis as suggested by some parties, but rather broadly outlined in a list available to all applicants. However, in the event that a direct cost is not explicitly listed, or does not easily fit into one of the listed categories, the applicant can submit justification as to how the cost either fits under one of the listed eligible costs, or why it should be eligible. The Commission will then determine whether this cost should be eligible. This approach will ensure that any costs that may arise as new technologies emerge that cannot currently be foreseen or specifically accounted for can be covered by the Broadband Fund.

167. In light of the above, the Commission determines that funding will be provided only for eligible costs, which include costs that are directly associated with project activities such as engineering and design, environmental scans and assessments, as well as the purchase and installation of equipment and infrastructure (including the provisioning of backhaul capacity and other one-time access-driven costs). These eligible costs will include, but are not limited to, the following:

- direct equipment costs, meaning the costs of the equipment required for project completion, including the costs of servers, switching and transmission equipment, fibre-optic cable, repeaters, radio and microwave equipment, towers, poles, shelters and enclosures, backup power supplies, and network broadband connectivity devices including upgrades and adaptations;
- direct material costs, meaning the costs of materials that can be specifically identified and measured as having been used for the implementation of the project;
- direct labour costs, meaning the portion of gross wages or salaries for work that can be specifically identified and measured as having been done on the project, including the one-time costs associated with the engineering and installation of capital equipment, network deployment, and service provisioning. These costs also include costs for initial technical training on equipment installation, operation, and maintenance for local staff in communities without year-round road access, to be completed by the end of the first year of operation;
- direct labour-related travel costs, meaning the costs of travel that are deemed necessary for the performance of the project, such as those associated with engineering, installation, network deployment, and service provisioning, considered on a case-by-case basis. For travel costs to be eligible, the purpose of each trip must be clearly documented. Travel expenses, at economy rates, shall be charged as actual costs; and
- other direct costs, meaning applicable costs that do not fall within the categories of direct equipment costs, direct material costs, direct labour costs, or direct labour-related travel costs, but that can be specifically identified and measured as having been incurred for the implementation of the project.

What costs should be ineligible?

Background

168. In Telecom Notice of Consultation 2017-112, the Commission asked parties to comment on whether any costs should be identified as ineligible.

Positions of parties

169. Several parties, including RCCI, Rothschild & Co. (Rothschild), and TCI, as well as the Government of Nunavut, proposed that the Commission should consider mirroring ISED's list of ineligible costs under the CTI program.

170. Parties differed on whether the costs of customer premises equipment (CPE) should be eligible. The BCBA and TBayTel argued that CPE is an important piece of hardware and constitutes a significant cost associated with the project, particularly in rural and remote areas. Blue Sky and Corridor Communications Inc. (CCI) argued that CPE costs are not typically eligible for reimbursement under funding programs and are normally supported by market forces.

171. Many parties, including the BCBA, the FMCC, NPF-PIAC, and RCCI, as well as the Government of Yukon, proposed offsetting operational losses in high-cost serving areas (HCSAs) by making certain ongoing costs eligible for all types of projects. The CCSA-ITPA argued that ongoing costs were built into the local service subsidy regime, and that while the Commission's focus has shifted to broadband services, the challenges related to serving HCSAs have not changed. CNOC and TCI opposed funding any ongoing costs, arguing that it would be inconsistent for the Commission to (i) require applicants to be able to support the long-term use of proposed projects and then (ii) fund projects that would not be sustainable without additional funding.

172. Parties were divided on whether the costs associated with training local workers should be eligible. The FMCC and SSi supported the Broadband Fund covering the costs of (i) hiring local residents to install and maintain facilities, and (ii) providing training to these residents when necessary. However, CNOC and RCCI submitted that costs for training to set up an ISP and ongoing training to implement the project should not be eligible.

173. The eligibility of energy costs was also contentious. The NEFC and SSi argued that ongoing energy costs in remote areas should be eligible. They noted that energy costs are high in the North, five times higher than in the South. CNOC, however, submitted that energy costs should be ineligible.

174. Parties disagreed on whether certain costs associated with participation in the application process should be eligible. The KRG submitted that application preparation costs should be eligible; otherwise, some projects may not be submitted. The BCBA, CANWISP, and the Government of Nunavut opposed this, with the BCBA arguing that any party that would be eligible for funding should be able to put together an application.

175. Many parties also addressed the eligibility of costs associated with reporting and compliance. The BCBA, Blue Sky, CANWISP, the FCM, and the Government of Yukon argued that certain costs associated with project management should be eligible because they are necessary costs that are directly related to the project. The AAMDC, CNOC, and the Government of Nunavut opposed the eligibility of these costs since they do not relate to the deployment of broadband infrastructure.
176. OpenMedia and SSi recommended a case-by-case approach to ineligible costs, arguing that determinations with respect to costs should be made in consultation with affected communities or at the Commission's discretion.

Commission's analysis and determinations

177. The Commission considers that having a list of ineligible costs that generally aligns with other existing funding programs would add certainty for applicants, since it would inform them which costs would not be covered under the Broadband Fund.
178. With regard to CPE costs, these costs are not typically eligible under funding programs. Further, since such costs are incurred only once there are customers, ISPs are generally reimbursed for these costs by end-users. Thus, the Commission considers that CPE costs should not be an eligible cost under the Broadband Fund.
179. The Broadband Fund was designed to fund capital projects to bring broadband Internet network infrastructure to underserved communities. Nevertheless, some parties raised the issue that, under the local service subsidy regime, the Commission subsidized both capital investments in voice networks and the operational expenses of service providers. They therefore proposed that several ongoing expenses, such as energy costs in remote areas, should be eligible for funding under the Broadband Fund, since these expenses are beyond the control of ISPs and can be so high that they may interfere with project sustainability.
180. Through the Broadband Fund, the Commission aims to encourage the building of infrastructure to help Canadians receive high-quality broadband services. However, projects must be capable of continuing to function after initial assistance from the Fund. Accordingly, the Commission considers that the Broadband Fund should not generally cover ongoing project costs.
181. Many parties also discussed the need for funding to train local employees in the installation and maintenance of facilities. While training costs are generally considered to be ongoing costs akin to overhead rather than direct costs associated with the building of a project, the Commission recognizes that it can be difficult to bring individuals with the required expertise to remote areas. The Commission considers that it would be beneficial for remote communities, especially those without year-round road access, to have individuals in the community who are able to provide technical support. Therefore, the Commission will allow applicants with proposed projects that cover communities without year-round road access to claim costs associated with the initial training of individuals to gain this expertise, but not ongoing training costs beyond the first year of operation of the network.

182. With respect to the costs for application preparation, these costs will be incurred by all applicants, even those that will not receive funding, so it would not be fair to allow these costs to be recovered only by successful applicants. Regarding the costs of ongoing monitoring and compliance, although these activities incur costs, the Commission already requires compliance with its regulatory policies and obligations, the costs for which are not reimbursed. Accordingly, the Commission considers that applicants should be able to complete their applications and ensure their regulatory compliance without funding assistance.

183. In light of the above, the Commission determines that for all types of projects, funding will not be provided under the Broadband Fund to cover costs including, but not limited to, the following:

- costs incurred after the project completion date;
- costs related to developing the application for funding;
- costs for existing capital assets, including land, buildings, and vehicles, as well as other indirect, fixed, and/or capital costs;
- land purchase costs and other costs related to purchasing land, buildings (except for equipment shelters not meant for human occupation), and associated real estate and other fees;
- costs for leasing land, buildings, and other facilities, including permanent shelters for housing network-related equipment (except for temporary facilities directly related to project construction);
- operational costs to run infrastructure built as a result of the project;
- costs for general repairs and ongoing maintenance resulting from the project and related structures;
- contingency provision costs;
- legal fees;
- taxes for which the applicant is eligible for a tax rebate and all other costs eligible for rebates;
- insurance costs;
- CPE costs;
- costs for any goods and services that are received through donations or in-kind;
- financing or carrying costs, loan costs, and interest payments;

- costs for general office space and equipment;
- costs for training to set up an ISP (except for initial costs for technical training on equipment installation, operation, and maintenance for local staff in communities without year-round road access, to be completed by the end of the first year of the project's operation);
- ongoing training costs to implement the project;
- costs for advertising/promotion activities; and
- radio and spectrum licensing fees.

Should open access be an eligibility criterion?

Background

184. In Telecom Notice of Consultation 2017-112, the Commission stated its preliminary view that an application would be given more weight if open access to elements of the network is proposed. The term “open access” refers to both retail and wholesale access.

Positions of parties

185. Incumbent telecommunications service providers generally opposed the idea of a wholesale open access eligibility criterion for access projects. In general, such a criterion was cited as an investment disincentive that would discourage applicants from submitting projects for funding and increase the amount of requested funding. Bell Canada submitted that it is unrealistic to expect significant demand for wholesale disaggregated access service in underserved areas given their remoteness and low population density. The CCSA-ITPA submitted that small, locally based ISPs have no market power and that any determination to regulate rates in advance would violate the Policy Direction, which requires that regulation rely on market forces to the maximum extent feasible and be minimally intrusive.

186. CNOC, OpenMedia, SaskTel, SSi, TBayTel, and TekSavvy Solutions Inc. (TekSavvy) supported wholesale open access as an eligibility criterion for publicly funded access infrastructure projects. CNOC, however, noted that the wholesale open access eligibility criterion should apply only to incumbents, and that for non-incumbents, it should instead be a weighted criterion.

187. Bell Canada, Eastlink, TCI, and Xplornet opposed wholesale open access as an eligibility criterion for transport infrastructure projects, arguing that it would be an investment disincentive and increase funding amounts. Most other parties supported such a criterion, particularly for fibre infrastructure projects.

188. CNOC submitted that wholesale open access should be an eligibility criterion for transport infrastructure projects by incumbent telecommunications service providers. However, CNOC proposed that for non-incumbents, wholesale open access should be an assessment criterion.

RCCI proposed that wholesale open access should be required for transport infrastructure projects.

189. The BCBA, TBayTel, and TCI submitted that if a wholesale open access eligibility criterion is imposed, it should not include regulated rates, since these should be market based. Eeyou and NPF-PIAC submitted that anchor institutions¹¹ should be offered wholesale access to transport infrastructure at cost.
190. Shaw submitted that wholesale open access should be required for the funded portion of the transport facility. NPF-PIAC expressed concern over selectively imposing wholesale open access obligations. NPF-PIAC noted that if non-funded transport infrastructure used to serve underserved communities is not subject to the same open access requirement, recipients could apply for funding from the Broadband Fund only for the access part of their project, excluding any funding for transport in their application, in order to be exempted from offering wholesale open access.

Wholesale open access to funded access infrastructure – Commission’s analysis and determinations

191. The Commission has previously determined that the large ILECs and cable companies (incumbents) possess market power regarding access infrastructure and, therefore, have the regulatory obligation to provide a wholesale high-speed access service across their serving territories, which includes densely populated urban communities, as well as sparsely populated rural and remote communities. This obligation would also apply to incumbents in their serving territories with respect to any Commission-funded access infrastructure.
192. With respect to making wholesale open access an eligibility criterion for non-incumbents, the Commission does not currently require non-incumbents to provide access service, given that they do not possess market power regarding access infrastructure. In addition, the Commission considers that the record of this proceeding does not provide any compelling (i) evidence that non-incumbents now have market power, or (ii) reasons why the Commission should require non-incumbents to commit to wholesale open access for proposed access infrastructure projects.
193. In light of the above, the Commission determines that applicants will not be required to commit to any additional wholesale open access obligations other than existing regulatory obligations, such as wholesale high-speed access services, with respect to the access portion of a proposed project.

Wholesale open access to funded mobile wireless access infrastructure – Commission’s analysis and determinations

194. An applicant that proposes to build mobile wireless access infrastructure will be subject to the regulatory obligations set out in Telecom Regulatory Policy 2015-177.

¹¹ Anchor institutions may be broadly defined as places that serve a public function (e.g. schools, medical facilities, libraries, First Nations band offices, and international border guard stations).

195. The conditions of licence associated with spectrum require all wireless carriers to offer wholesale mobile wireless roaming services to other wireless carriers. Therefore, any wireless carrier that is awarded funding from the Broadband Fund to build mobile wireless infrastructure will be required to offer wholesale mobile wireless roaming services to other wireless carriers. Further, in Telecom Regulatory Policy 2015-177, the Commission set out wholesale mobile wireless roaming service obligations for the three national wireless carriers, Bell Mobility Inc., RCCI, and TCI. The Commission indicated that since the national wireless carriers possessed market power in the wholesale mobile wireless service market, regulatory obligations, including regulated roaming rates, needed to be imposed. The Commission did not impose the same regulatory obligations with respect to wholesale mobile wireless roaming services and rates on small wireless service providers, since it did not consider these providers to possess market power in the wholesale mobile wireless service market. Any mobile wireless access infrastructure upgrades and builds funded through the Broadband Fund would be part of the national Global System for Mobile communication (GSM)-based wholesale roaming service market.

196. In light of the above, the Commission determines that it will not impose additional wholesale mobile wireless roaming service obligations, other than existing regulatory obligations, as an eligibility criterion under the Broadband Fund.

Wholesale open access to funded transport infrastructure – Commission’s analysis and determinations

197. The Commission does not mandate or regulate the provision of wholesale high-speed transport services provided by incumbents, with the exception of Northwestel Inc. (Northwestel).¹² However, wholesale open access to transport infrastructure could (i) enable other service providers to expand their serving territory within a funded geographic area and extend the transport infrastructure to neighbouring communities, and (ii) result in the further deployment of mobile wireless technology to underserved communities and along major transportation roads. Therefore, the Commission considers that for communities to obtain the greatest benefit from the funded transport infrastructure, wholesale open access to that transport infrastructure should be required in order to obtain funding under the Broadband Fund.

198. Parties did not suggest any configurations or speeds for wholesale transport services. Given the speed and capacity goals set out in the universal service objective, the Commission considers that applicants should be required to commit to providing, at a minimum, wholesale transport services at one of the following speeds to be eligible for funding under the Broadband Fund: 100 Mbps, 1 Gbps, or 10 Gbps. Commitments by applicants to provide wholesale open access service at a speed higher than one of the listed speeds and also offer additional higher-speed transport services would be considered in the assessment stage.

¹² Northwestel has an existing wholesale regulatory obligation to offer a Wholesale Connect service, pursuant to a tariff, in its serving territory.

199. Existing wholesale regulatory obligations would apply to any proposed project to build or upgrade transport infrastructure by an incumbent in its serving territory.
200. In light of the above, the Commission determines that to be eligible for funding under the Broadband Fund, an applicant that proposes a project to build or upgrade any transport infrastructure must commit to offering, at a minimum, wholesale open access to transport infrastructure at one of the following speeds: 100 Mbps, 1 Gbps, or 10 Gbps, at the rates, terms, and conditions set out in the application. PoPs along the transport route will also be required to comply with the open access requirements.

Retail open access to funded transport infrastructure – Commission’s analysis and determinations

201. The general consensus among parties was that access to funded transport infrastructure should be available to non-carriers, including end-customers such as anchor institutions, businesses, and other government and non-government organizations.
202. A requirement for retail open access to funded transport infrastructure is consistent with the Commission’s objective to provide broadband Internet access services in underserved communities. Anchor institutions, businesses, and other government and non-government organizations could require higher-speed services comparable to the services that competitors require to serve multiple end-users. Given these greater needs, large retail customers often require non-standard consumer services, including transport services.
203. To ensure that large retail customers can benefit from funded transport infrastructure projects, the Commission considers that applicants should be required to commit to offering retail open access to transport infrastructure. In light of the above, the Commission determines that to be eligible for funding under the Broadband Fund, an applicant that proposes a project to build or upgrade transport infrastructure must commit to providing retail open access to that infrastructure. The Commission affirms that existing regulatory obligations (e.g. the requirement to file tariffs for services that are not forborne from regulation) will apply to any funded project to build or upgrade transport infrastructure.

Should pricing and affordability be eligibility criteria?

Background

204. In Telecom Notice of Consultation 2017-112, the Commission stated that applications would be given more weight the lower the monthly price for subscribers to a broadband Internet access service plan that includes a higher data transfer.

Positions of parties

205. Blue Sky, Cybera, EOWC-EORN, the FMCC, the National Campus and Community Radio Association (NCRA), NPF-PIAC, OpenMedia, and SWIFT, as well as the Government of Ontario, submitted that the Commission should require applicants to propose broadband Internet access service prices (i) in funded areas that are reasonably comparable to those in urban areas, and (ii) that address the needs of low-income households.

206. The Government of Yukon proposed that the Commission should reject projects that do not offer broadband Internet access service prices in funded areas that are reasonably comparable to those in urban areas, but indicated that prices are less important than the speed, capacity, and quality of the services to be made available. The Government of Nunavut proposed that pricing level should have the greatest weight on its suggested assessment scale. The FCM, ONN, and SWIFT submitted that the affordability of broadband Internet access services should be a priority within the assessment criteria. NPF-PIAC submitted that affordability should be addressed through a separate funding mechanism or, in the alternative, through a requirement for applicants to participate in initiatives to offer discounted services to low-income persons.
207. NPF-PIAC and the Government of the Northwest Territories submitted that along with facilitating the rollout of high-speed broadband Internet access services to priority areas, the Commission must ensure that such services are affordable. The Government of the Northwest Territories submitted that this concern is particularly great in Northern Canada, where existing broadband Internet access service rates are far above those in Southern Canada.
208. While the Government of the Northwest Territories supported the Commission considering broadband Internet access service prices when evaluating applications for funding, it raised the concern that the Commission's preliminary view that applications will be given more weight the lower the monthly price for subscribers to a broadband Internet access service plan that includes a higher data transfer would make it very difficult for proposed projects to provide service in the highest-cost areas of the country, such as in Northern Canada. The Government of the Northwest Territories suggested that rather than evaluating applications by comparing proposed prices, the Commission should require applicants to offer specific maximum prices, which would differ depending on the speed and other characteristics of the service and would be based on rates at which a comparable service is generally available in areas not requiring financial assistance.
209. SaskTel submitted that the Commission should not regulate retail broadband Internet access service rates but should instead introduce retail rate caps that would remain in place for five years.

Commission's analysis and determinations

210. The Commission does not regulate the retail rates for broadband Internet access services, except those provided by Northwestel over terrestrial facilities. The Commission has not found compelling reasons over the course of this proceeding to change this approach, and therefore considers that it should continue to apply. Nonetheless, because the Commission is of the view that it is important that funded projects are as accessible to Canadians as possible, it considers that subscriber pricing should be an eligibility criterion for proposed access projects.
211. Specifically, the Commission considers it appropriate to require applicants to commit to providing retail broadband Internet access service at proposed prices that are no higher than those offered in non-funded areas where there is generally competition between major fixed

facilities-based service providers, such as an ILEC and a cable company. This approach would serve the objective of the Broadband Fund to provide access to broadband services to achieve the universal service objective in order to close the gap in connectivity in underserved areas.

212. To define the above-mentioned non-funded areas, the Commission will issue, in the application guide, a list of areas that could be used as a basis to compare proposed broadband Internet access service packages, by province and territory. The Commission expects this list to be similar to the list of urban centres in its 2017 *Communications Monitoring Report*,¹³ which includes major urban centres or communities by province and territory. The Commission considers that this approach would (i) not discourage applicants from submitting project proposals to provide broadband Internet access services in rural and remote communities that are more costly to serve because they would have a relatively local comparative, and (ii) give some assurance that customers will receive equitable rates.
213. The minimum speed eligibility requirement set out above means that, for a proposed project to be eligible for funding, it must be capable of offering broadband Internet access services at actual speeds of at least 25 Mbps download and 5 Mbps upload. While the Commission did not set out to directly address affordability through Telecom Notice of Consultation 2017-112, it stated that its goal is to ensure that Canadians are able to connect to quality and innovative communications services at affordable prices, and reiterated its responsibilities under the *Telecommunications Act*.¹⁴ The Commission considers that subscriber rates for broadband Internet access services provided with the help of the Broadband Fund should be comparable to or lower than those in similar other areas where access infrastructure has been built without broadband service funding and that applicants should offer a variety of broadband Internet access service packages. Accordingly, applicants must commit to providing affordable subscriber rates for broadband Internet access service packages (including different prices, speeds, and capacities) to address the needs of customers, including low-income households.
214. Further, these prices should be available for a reasonable length of time. The Commission considers that a minimum period of five years would be appropriate, since it would provide enough time for the adoption of broadband Internet access services in previously underserved areas.
215. In light of the above, the Commission determines that to be eligible for funding under the Broadband Fund, applicants with proposed projects to provide fixed or mobile wireless broadband Internet access service to customers must
- identify a list of various broadband Internet access service packages, with rate, speed, and capacity levels that address different customer needs, including those of

¹³ See Tables A.9.1 and A.9.2.

¹⁴ In particular, paragraph 7(b): to render reliable and affordable telecommunications services of high quality accessible to Canadians in both urban and rural areas in all regions of Canada.

low-income households. These packages must include rates that are identical to or lower than those offered by a facilities-based service provider in one of the major urban centres or communities, to be identified by the Commission, in the proposed project's province or territory for reasonably comparable speed and capacity packages.

- commit to providing broadband Internet access service packages at a rate no higher, and at a speed and with a capacity no lower, than the ones proposed in their application, for a minimum of five years from the project completion date.

Should community consultations be an eligibility criterion?

Positions of parties

216. The Association of Manitoba Municipalities (AMM), the BCBA, the BC Libraries Cooperative (BCLC), the CCSA-ITPA, CNOC, the FCM, the FMCC, the Inuvialuit Regional Corporation (Inuvialuit), the NEFC, NPF-PIAC, OpenMedia, Shaw, SSi, Videotron, the West Parry Sound SMART Community Network Inc. (WPS SMART), and Xplornet, as well as the governments of British Columbia, the Northwest Territories, Nunavut, Quebec, and Yukon, all supported applicants consulting with communities to some degree. The FCM, the FMCC, the NEFC, NPF-PIAC, and SSi submitted that community consultations should be an eligibility criterion. The BCBA, CNOC, OpenMedia, and Shaw, as well as the Government of Nunavut, submitted that community support for applications should be reflected in the assessment criteria to ensure that affected communities are consulted and satisfied that the proposed project is in their best interests.

217. Eeyou, the FMCC, Inuvialuit, NPF-PIAC, RCCI, SSi, and TCI, as well as the Government of British Columbia and the KRG, submitted that applicants should be required to consult with Indigenous communities during both the application process and the project evaluation process.

218. Bell Canada, the CCSA-ITPA, Cogeco, Eastlink, Eeyou, RCCI, Rothschild, SaskTel, TBayTel, and TCI submitted that the Commission should exercise caution with regard to using community consultations as a criterion to evaluate applications. For example, the CCSA-ITPA, Cogeco, SaskTel, TBayTel, and TCI argued that it would be problematic to make community consultations an eligibility criterion, since (i) some communities may not be consulted within the necessary timelines, (ii) it would be a disincentive to small service providers, and (iii) communities could use community consultations as a bargaining chip with prospective service providers.

Commission's analysis and determinations

219. Consultations between applicants and communities is a contributing aspect of effective project planning and successful project implementation. Such consultations establish a line of communication between the community and the applicant and provide the opportunity for applicants to better understand the needs of the affected community. Consultations can assist with project planning activities (e.g. informing applicants of established or asserted Aboriginal or treaty rights that may be affected by the proposed project, identifying anchor institutions and potential locations for infrastructure, gaining access to community

rights-of-way, or determining proposed project service coverage) and help identify potential issues or challenges. They are also an opportunity for an applicant to learn about competing or complementary proposed projects and to ensure that its business plan is as accurate as possible.

220. Similarly, such consultations enable communities to communicate their needs to the applicant and participate in proposed projects, whether financially or in-kind.

221. The Commission expects that community consultations will assist it in identifying the projects that are most likely to achieve the objective of the Broadband Fund and best meet community needs. The Commission therefore considers that it should include community consultations as an eligibility criterion, by requiring applicants, at a minimum, to demonstrate that they have reached out to the communities they are proposing to serve.

222. The Commission notes that proposed projects may impact underserved Indigenous communities, Aboriginal rights, or treaty rights. Accordingly, applicants should not only ensure that affected communities are consulted in the context of developing their plans, but the Commission expects applicants to identify any established or asserted Aboriginal or treaty rights that might be affected by the proposed project and to commit to undertaking any further consultations that may be necessary.

223. In light of the above, the Commission determines that to be eligible for funding from the Broadband Fund, an applicant must

- provide evidence that it has consulted, or attempted to consult, with communities affected by proposed projects, either individually or through elected officials, community associations, or other representative bodies; and
- indicate whether the proposed project will affect any established or asserted Aboriginal or treaty rights, and commit to undertaking any further consultations that may be necessary.

224. Given the importance that the Commission places on meaningful community consultations, it will also consider the quality of the consultations and the involvement of the community as an assessment criterion.

Assessment criteria

Introduction

225. In the second stage of the evaluation process, the Commission will evaluate eligible projects using a list of assessment criteria. The Commission has selected the assessment criteria that will (i) best evaluate the benefits arising from proposed projects for consumers and communities through improvements in broadband service offerings, and (ii) enable projects to be selected from various geographic areas across the country, notwithstanding the project size, location, or technology proposed.

Commission's analysis and determinations

226. To select the assessment criteria, the Commission considered an extensive variety of suggestions from parties, covering more than 40 different potential assessment criteria and models for weighting and assessment. While most of the suggested criteria were best suited for fixed broadband Internet access service projects, the Commission also had to select assessment criteria applicable to fixed transport and mobile wireless projects. As outlined below, the Commission has selected certain assessment criteria that will apply to all project types, and different sets of assessment criteria for access, transport, and mobile wireless projects. For eligible projects to build or upgrade a combination of different types of infrastructure, the Commission will evaluate such projects using the assessment criteria for each of the relevant project types.
227. The Commission considers that it would be preferable to have a narrow list of assessment criteria, such that each criterion is given more importance in the identification of high-quality projects. In addition, the Commission considers that some elements that were suggested for assessment criteria would not be as meaningful on their own. Accordingly, in designing the assessment criteria, the Commission has combined some of the suggested elements so that they will be considered together at the assessment stage.
228. The Commission considers that each assessment criterion is important and should receive due consideration when it evaluates whether a project is of high quality. The Commission considers that giving more weight to certain criteria would diminish the importance of the remaining criteria, which could disadvantage certain projects or be detrimental to communities in certain regions or to projects proposing certain technology types. The Commission therefore considers that it should not generally use an assessment criteria weighting system, as proposed by some parties. However, there could be circumstances in which certain criteria should be emphasized to resolve a specific issue. In such cases, the Commission will advise parties in the application guide or in the call for applications that it will weigh certain criteria differently.
229. In light of the above, the Commission determines that, unless otherwise indicated in the application guide or in the call for applications, it will use no special weighting for each assessment criterion.
230. The list of assessment criteria that the Commission will use to evaluate applications is set out below. Detailed information that applicants will be required to provide for each assessment criterion will be set out in the application guide.

All projects – Technical merit

231. The objective of this criterion is to identify projects that are efficient and sustainable, and that are therefore more likely to continue meeting the broadband service requirements of underserved eligible geographic areas over the long term. The Commission will assess the technical merit of proposed projects based on the following:
- **Feasibility:** The Commission will evaluate the technical possibility of deploying infrastructure and continuing to operate in the eligible geographic area(s) proposed. For

example, the Commission will consider environmental conditions and terrain to determine whether the proposed project is feasible to implement and maintain.

- **Scalability:** The Commission will evaluate the project's ability to provide higher speeds, greater capacity, and improved quality of service, as well as to serve more clients and/or a larger area over the five years following project completion. For proposed projects to offer services below the levels set out in the universal service objective, the Commission will consider the project's ability to offer universal service objective-level services in the near future. The Commission will also consider existing capacity and how additional capacity provided by the proposed project will complement and/or expand coverage to underserved areas.
- **Sustainability:** The Commission will evaluate the potential of the deployed technology to be upgraded to offer broadband services that meet or exceed the universal service objective. The Commission will consider factors such as the end of life of the chosen technology and how the technology would complement or replace existing infrastructure to achieve the universal service objective for the households and organizations in the eligible geographic area(s).
- **Resiliency:** The Commission will evaluate the proposed network's ability to provide and maintain an acceptable level of service during failures and challenges in normal operations, such as physical failures (e.g. fibre cuts) or radio failures due to extreme weather. The Commission will also evaluate the inherent resiliency of the proposed project and how the project would complement existing infrastructure.

All projects – Financial viability

232. The objective of this criterion is to evaluate the potential financial success of a proposed project, based on an accurate and realistic business model, to ensure long-term project viability and sustainability. The Commission will assess the financial viability of proposed projects based on the following:

- The net present value (NPV), which is the difference between the present value of cash inflows and the present value of cash outflows over a period of time. The NPV is used in capital budgeting to analyze the profitability of a project. The higher the NPV, the higher the probability that a project will be profitable.
- The internal rate of return (IRR), which is a metric used in capital budgeting to estimate the profitability of potential investments. IRR is a discount rate that makes the NPV of all cash flows from a particular project equal to zero. Both the NPV and IRR calculations rely on the same formula.
- The business plan of the applicant, which includes, but is not limited to, business assumptions of the market for the services to be provided within the eligible geographic area and the applicant's marketing strategy to gain subscribers in the first year.

- A risk assessment and mitigation plan for the identified risks of the project, including the (i) risk of the applicant not completing the construction, (ii) environmental risk in the build (e.g. trench digging), and (iii) pricing risks in the supply of services and wholesale transport expenses. The Commission will also assess the risks of the project related to the business assumptions in the business plan.

All projects – Community consultations and level of involvement

233. The objectives of this criterion are to (i) ensure that the applicant has consulted or attempted to consult with affected communities, including Indigenous communities, and (ii) ensure that affected communities support the project and will take up future services. As noted above, to be eligible for funding, applicants must provide evidence that they have consulted, or attempted to consult, with the communities affected by the proposed project. The Commission will use that information to evaluate community support for the project. At the assessment stage, the Commission will consider a project to be of higher quality based on a greater level of community support demonstrated in the eligible geographic area(s). This support could take many forms, for example, a market study, a letter of support from an elected official, a petition from potential subscribers, and/or community investment (financial or otherwise) in the project.

All projects – Level of funding from other sources

234. The objective of this criterion is to measure whether the applicant has successfully raised funds for the proposed project and how much was raised, to ensure that telecommunications companies and various levels of government continue to invest in robust broadband infrastructure and that funding from the Broadband Fund is used efficiently. The Commission will consider a project to be of higher quality based on a greater level of funding received from sources other than the Broadband Fund towards total project costs. These sources include both the public and private sectors. The Commission will evaluate this criterion based on the percentage of the amount requested from the Broadband Fund.

Fixed broadband Internet access service projects – Current gap with respect to the availability of universal service objective-level services

235. The objective of this criterion is to identify eligible geographic areas where current service availability is furthest from the universal service objective and investment in broadband infrastructure is most needed. It is likely to be more expensive to provide universal service objective-level services in these areas. The Commission will consider a project to be of higher quality based on how far the broadband services that are currently offered in the eligible geographic area(s) are from the speed, capacity, and quality of service levels set out in the universal service objective.

Fixed broadband Internet access service projects – Proposed level of service

236. The objective of this criterion is to measure the level of broadband Internet access service to be offered to customers once the proposed project is finished. The Commission will consider a project to be of higher quality based on how close the speed, capacity, and quality of the

proposed broadband Internet access service in the eligible geographic area(s) would be to meeting or exceeding the levels set out in the universal service objective.

Fixed broadband Internet access service projects – Coverage

237. The objective of this criterion is to measure the number of households and businesses to be served. The Commission will consider a project to be of higher quality based on how extensive the level of proposed coverage would be. This criterion includes both service coverage, which is the number of households and businesses served, and coverage density, which is the percentage of underserved households and businesses that will be served in the eligible geographic area(s).

Fixed broadband Internet access service projects – Cost per household

238. The objectives of this criterion are to ensure that funds are used efficiently and to help connect as many households as possible. The Commission will consider a project to be of higher quality based on how low the overall Broadband Fund cost would be per household to be served in the eligible geographic area(s).

Fixed broadband Internet access service projects – Retail service pricing and offers

239. The objective of this criterion is to ensure that subscribers will be provided with broadband Internet access services at affordable prices and in various service packages. Eligible applicants must propose to offer various service packages and propose rates that are equal to or lower than those offered by facilities-based service providers in one of the major urban centres or communities in the affected community's province or territory for reasonably comparable speeds and capacity. The Commission will consider a project to be of higher quality based on how low the monthly prices would be for subscribers and how varied the broadband Internet access service package options would be in the eligible geographic area(s).

Transport projects – Level of improvement in network and capacity offered

240. The objective of this criterion is to measure the difference between the network capacity and interconnection service speeds that are currently offered in the eligible geographic area(s), and those that will be offered as a result of the proposed project. The Commission will consider a project to be of higher quality based on how large the level of improvement would be in the service speeds and capacity offered on a wholesale and retail basis.

Transport projects – Number of PoPs for wholesale and retail services along the proposed transport route

241. The objective of this criterion is to encourage applicants to provide access to more PoPs in the transport network. The Commission will consider a project to be of higher quality based on the number of PoPs provided along the proposed transport route, and the potential benefit that this would represent in extending to underserved areas fixed broadband Internet access service or the latest generally deployed mobile wireless technology. The Commission notes that not all PoPs have to be in eligible communities, since some PoPs might need to be added along the transport route to get to the eligible community. However, these additional PoPs

can have many uses, such as to branch out to other eligible communities, offer competitive services, and enable the development of the mobile wireless network.

Transport projects – Number of communities and households to be served

242. The objective of this criterion is to measure how many people and communities will have improved broadband services as a result of the project. The Commission will consider a project to be of higher quality based on a greater number of communities and households that would benefit from the project.

Transport projects – Presence, type, and number of anchor institutions to be served

243. The objective of this criterion is to ensure that broadband services are provided to important elements of the community so that residents can benefit from transport projects. The Commission will consider a project to be of higher quality based on how many anchor institutions would be served. The types of anchor institutions to be served, such as schools or medical facilities, could also result in an assessment that a project is of higher quality.

Transport projects – Open access service offerings

244. The objective of this criterion is to ensure that varied and affordable competitive services will be available as a result of the project. The Commission will consider a project to be of higher quality based on (i) how low prices would be for subscribers of wholesale and retail open access services, (ii) how high the broadband speeds would be, and (iii) how broad the range of broadband services would be.

Mobile wireless projects – Level of service improvement

245. The objective of this criterion is to ensure that priority is given to eligible geographic areas where there is currently no service. The Commission will consider a project to be of higher quality based on how much improvement there would be in the network and capacity offered as a result of the project. The Commission will take into consideration whether mobile wireless services exist in the area where the project is proposed to offer the latest generally deployed mobile wireless technology (currently LTE).

Mobile wireless projects – Geographic coverage

246. The objective of this criterion is to measure the extent of the geographic footprint where universal service objective-level mobile wireless service will become available as a result of the proposed project. The Commission will consider a project to be of higher quality based on how many kilometres of major transportation roads (classified by Statistics Canada as having a street rank code of 1, 2, or 3) would be covered by the project. This metric will not be limited to service areas such as hexagons, since there can be long stretches of major transportation roads without any households, thereby not triggering the creation of a hexagon. The Commission may also take into account the street rank of the road to be served.

Mobile wireless projects – Household coverage

247. The objective of this criterion is to measure the number of households that will be able to access universal service objective-level mobile wireless service as a result of the proposed project. The Commission will consider a project to be of higher quality based on how many households would receive universal service objective-level mobile wireless service.

Selection considerations

Introduction

248. Once the Commission has identified high-quality projects based on its evaluation of projects against the assessment criteria, it will select a subset of these projects, based on defined selection considerations, to receive funding. In deciding between high-quality projects, the Commission will not only consider whether individual projects could contribute to meeting the universal service objective, but also which set of projects would have the most positive impact on Canadians, keeping in mind the policy objectives set out in the *Telecommunications Act*, including the need to develop broadband service offerings across the country and to meet the economic and social needs of users.

Efficient use of funds

Commission's analysis and determinations

249. In Telecom Regulatory Policy 2016-496, the Commission determined that for the first five years of the Broadband Fund, a maximum of \$750 million would be distributed, as follows: no more than \$100 million in the first year, which would increase by \$25 million annually over the following four years to reach an annual cap of \$200 million.¹⁵ Further, the Commission stated that up to 10% of the total annual limit of the Broadband Fund would be allocated to satellite-dependent communities for the first five years of the Fund's operation. Consequently, only a certain amount of funds can be distributed in a given year.

250. Accordingly, when selecting projects for funding, the Commission will have to consider the amount of funding required for each project, when such funding should be distributed, and the amount of funding available. Additionally, there may be instances where different high-quality projects cover the same eligible geographic area(s) or where public funding from another source is committed to a similar project. In such instances, the Commission must retain the flexibility to distribute funding in a manner that does not cause overlap in projects or funding sources so as to ensure the efficient use of the funds.

251. In light of the above, the Commission determines that when it selects projects for funding from the identified high-quality projects, it will give special consideration to the efficient use of funds.

¹⁵ Pursuant to Telecom Regulatory Policy 2016-496, the annual increase in funds available in years four and five of the Broadband Fund is contingent upon a review in the third year to ensure that the Fund is managed efficiently and is achieving its intended purpose.

Projects in multiple regions of Canada

Positions of parties

252. Several parties proposed that the Commission should assign a set amount of funding to specific geographic areas. Bell Canada and NPF-PIAC, for example, proposed dividing the funding into envelopes corresponding to broad geographic regions of Canada. Bell Canada proposed that the Commission could thus launch a call for applications for each envelope for a certain amount of money designated for underserved areas in a specific region.
253. Cogeco, Eastlink, the Fédération québécoise des municipalités, and SaskTel supported the creation of different funding envelopes for specific geographic regions. In addition, Eastlink submitted that since there are gaps in the availability of broadband service in each province and territory, funds should be earmarked for each province and territory to ensure that subscribers located in the areas for which contributions to the Broadband Fund are made benefit from broadband services.
254. The BCBA, the CCSA-ITPA, CNOC, Eeyou, the FMCC, the NEFC, RCCI, Rothschild, Shaw, SSi, and TCI opposed allocating funds by province, territory, or region. The CCSA-ITPA considered that such an approach would restrict the Commission's discretion to distribute funds where they can produce the greatest and most immediate benefit. CNOC considered that multiple calls for various envelopes would be too unwieldy to manage and would needlessly complicate the funding regime. The FMCC and Rothschild submitted that funding envelopes would significantly disadvantage certain areas of Canada.
255. RCCI submitted that a regional allocation of funds would be inefficient, likely impractical, and problematic, since fund distribution would not reflect the locations of underserved households. CNOC, SSi, and the Government of the Northwest Territories opposed the allocation of funds based on the percentage of telecommunications service subscribers or population numbers. TCI submitted that the Commission should not attempt to forecast the ideal locations of projects, but simply pick the projects that would most effectively bring broadband services to underserved communities.
256. CNOC considered that it would be a failure of the Broadband Fund if a worthwhile project were denied funding due to a lack of funds to be distributed in a certain region, while less-deserving projects elsewhere in Canada would be funded for the sake of regional fairness.

Commission's analysis and determinations

257. In general, parties proposed the use of funding envelopes to either make funding proportional to the various regions of Canada, or make the application process more efficient for applicants and the Fund administrator(s). The Commission considers that since underserved areas in Canada are not necessarily distributed proportionally throughout the country, attempting to distribute funds proportionally would likely disadvantage some underserved areas of Canada. In addition, the creation of fair funding envelopes would (i) be extremely challenging, (ii) likely be arbitrary and prone to error, and (iii) result in some areas receiving much less funding than needed. Further, without funding envelopes, the Commission would

retain the discretion to choose the most suitable projects for funding regardless of the region(s) that the projects propose to serve.

258. Accordingly, the Commission will not create funding envelopes under the Broadband Fund, with the exception of the portion of the Fund that is reserved for satellite-dependent communities, as discussed in the section below entitled “How will projects for satellite-dependent communities be evaluated and selected?”.

259. However, paragraph 7(a) of the *Telecommunications Act* sets out as a telecommunications policy objective to facilitate the orderly development throughout Canada of a telecommunications system that serves to safeguard, enrich, and strengthen the social and economic fabric of Canada and its regions. Paragraph 7(b) sets out as an objective to render reliable and affordable telecommunications services of high quality accessible to Canadians in both urban and rural areas in all regions of Canada. Consistent with these objectives, the Commission intends to, as much as possible, distribute funding from the Broadband Fund to underserved areas in multiple regions of Canada and not only in a single region or a small number of regions.

260. In light of the above, the Commission determines that when selecting projects for funding from the identified high-quality projects, it may give special consideration to selecting projects in multiple regions of Canada.

Type of project

Background

261. In Telecom Regulatory Policy 2016-496, the Commission indicated that the priority would be to meet the universal service objective for fixed broadband Internet access service, given that the gap in achieving universal service objective-level service is larger for fixed broadband Internet access service than for mobile wireless service. In Telecom Notice of Consultation 2017-112, the Commission stated that it would examine whether fixed broadband infrastructure projects should be prioritized over mobile wireless infrastructure projects, and whether access infrastructure projects should be prioritized over transport infrastructure projects.

Positions of parties

262. SaskTel and TCI argued that the majority of funding should be allocated to access infrastructure projects, since ISED’s CTI program focused on new transport infrastructure. The BCBA, the CCSA-ITPA, EOWC-EORN, the FCM, TBayTel, and Telesat Canada (Telesat), as well as the Government of Nunavut, submitted that access infrastructure projects and transport infrastructure projects should have equal priority and that similar kinds of projects should be evaluated against each other.

263. CANWISP, CNOC, the FMCC, the NEFC, RCCI, Rothschild, Shaw, SSi, and Videotron, as well as the governments of Nova Scotia and Yukon, submitted that transport infrastructure projects should be prioritized over access infrastructure projects. Some parties argued that

once sufficient transport infrastructure is in place, market forces would make available any required access infrastructure.

264. The majority of parties that commented on this issue favoured prioritizing fixed broadband infrastructure projects over mobile wireless infrastructure projects, although some parties, such as Eastlink, Eyou, and TCI, considered that the funding of mobile wireless infrastructure projects is still important.

Fixed broadband infrastructure projects and mobile wireless infrastructure projects – Commission’s analysis and determinations

265. While the Commission stated in Telecom Regulatory Policy 2016-496 that its priority would be to meet the universal service objective for fixed broadband Internet access service, several parties provided concrete evidence that (i) many areas in Canada are underserved with regard to mobile wireless infrastructure, and (ii) both residents and non-residents in those areas are disadvantaged as a result of that lack of service.

266. Although the Commission considers mobile wireless infrastructure projects to be important, it considers that fixed broadband infrastructure projects would help achieve the objective of the Broadband Fund more quickly than mobile wireless infrastructure projects. Specifically, investment in fixed broadband infrastructure projects, such as transport and access infrastructure projects, would likely enable broadband services to be provided to more Canadians over the long term than mobile wireless infrastructure projects.

267. Further, the funding of fixed broadband infrastructure projects, particularly transport projects that comply with the open access assessment criterion described above, could provide a vehicle for mobile wireless service providers to expand their service offerings. Also, as argued by some parties, wireless service offerings may expand organically as a result of market forces, without the need for public funding. Accordingly, the Commission considers it appropriate to prioritize fixed broadband infrastructure projects over mobile wireless infrastructure projects.

268. In light of the above, the Commission determines that when selecting projects for funding from the identified high-quality projects, it may give special consideration to fixed access or transport infrastructure projects over mobile wireless infrastructure projects.

Transport infrastructure projects and fixed access infrastructure projects – Commission’s analysis and determinations

269. Parties provided compelling reasons why the Commission should fund both transport infrastructure projects and fixed access infrastructure projects. Both types of projects are required to enable broadband services that are capable of achieving the universal service objective to be provided to all Canadians.

270. However, an underserved area with insufficient transport infrastructure would likely not be able to offer universal service objective-level broadband services, even if it were provided with access infrastructure using the best technology available. As a result, some underserved areas will likely remain underserved until sufficient transport infrastructure is available.

Further, unlike transport infrastructure projects, which can be extended to provide service to surrounding areas, access infrastructure projects are generally not scalable to provide service in multiple areas and cannot provide the foundation for future broadband infrastructure projects in surrounding underserved areas.

271. In contrast, transport infrastructure projects would likely provide the foundation to expand the broadband network, since service providers could access that transport infrastructure and undertake other fixed access and transport infrastructure projects in underserved areas that would have previously been impossible.

272. Accordingly, with a view to providing access to broadband services to as many Canadians as possible in the long term, the Commission considers it appropriate to prioritize transport infrastructure projects over fixed access infrastructure projects.

273. In light of the above, the Commission determines that when selecting projects for funding from the identified high-quality projects, it may give special consideration to transport infrastructure projects over fixed access infrastructure projects.

Social considerations

Background

274. In Telecom Notice of Consultation 2017-112, the Commission did not raise the question of whether it should take any social considerations into account when selecting projects for funding. During the course of the proceeding, however, parties raised the issue of whether the Commission should provide special consideration to proposed projects that would serve Indigenous communities and official language minority communities.

Positions of parties

275. Eeyou, the FMCC, Inuvialuit, NPF-PIAC, RCCI, SSi, and TCI, as well as the Government of British Columbia and the KRG, submitted that Indigenous communities should be consulted as part of the funding process. Further, the BCBA, the FMCC, Inuvialuit, the NCRA, RCCI, and TCI argued that Indigenous communities should be a priority under the Broadband Fund.

276. Blue Sky, Cybera, the English-Language Arts Network, the FMCC, the NCRA, NPF-PIAC, and OpenMedia also submitted that there should be a minimum amount of funds dedicated to official language minority communities.

Commission's analysis and determinations

277. The Commission considers that it could be appropriate to take various social policy considerations into account when selecting between high-quality projects. In particular, the Commission considers that, when selecting projects for funding, it may give special consideration to proposed projects that would serve Indigenous communities.

278. As well, consistent with the Government of Canada's commitment in the *Official Languages Act* to support and assist in the development of English and French linguistic minority communities in Canada, the Commission considers that it may give special consideration to

proposed projects that would serve official language minority communities when it selects projects for funding.

279. In light of the above, the Commission determines that when selecting projects for funding from the identified high-quality projects, it may give special consideration to whether the communities affected by proposed projects are Indigenous communities or official language minority communities.

Other factors that were considered – New network builds versus upgrades to existing networks

Background

280. In Telecom Notice of Consultation 2017-112, the Commission stated that it would examine whether new broadband infrastructure builds should be prioritized over upgrades to existing broadband infrastructure that does not currently meet the criteria for the broadband portion of the universal service objective.

Positions of parties

281. Some parties, including the BCBA, the FMCC, RCCI, Rothschild, SaskTel, and SWIFT, as well as the Government of Yukon, submitted that the Commission should prioritize new network builds over upgrades of existing networks. Specifically, these parties generally argued that the Commission should prioritize funding new network builds in underserved areas where there is no sound business case to build such networks, as opposed to funding a network upgrade in an underserved area where a network exists and could be upgraded or extended in the foreseeable future.

282. SWIFT submitted that in underserved areas with existing networks, the Commission should encourage ILECs to decommission legacy technologies by overbuilding them with new networks that are scalable as demand for connectivity grows.

283. CANWISP, the CCSA-ITPA, EOWC-EORN, NPF-PIAC, and TBayTel, as well as the Government of Nova Scotia, argued that proposed projects for new network builds and proposed projects for upgrades to existing networks should receive equal treatment. For example, the CCSA-ITPA and the FCM indicated that proposed projects for upgrades to existing networks may prove to be a highly effective means of meeting the universal service objective, and that the Commission should take advantage of such projects.

Commission's analysis and determinations

284. There are many underserved areas where the existing broadband network is not currently capable of achieving the universal service objective. The Commission considers that the upgrade or expansion of existing networks could (i) be an efficient use of funds, (ii) be a cost-effective method of helping an underserved area receive broadband services capable of achieving the universal service objective, and (iii) incent service providers to invest in such networks if it is currently not economically viable to do so.

285. However, while proposed projects for network upgrades can bring efficiencies compared to proposed projects to build new infrastructure, existing infrastructure may have limitations in

the technology that would prevent it from being scalable. Accordingly, the Commission considers that whether a proposed project is a new network build or a network upgrade should not be a special consideration with respect to project selection.

286. In light of the above, the Commission determines that when selecting projects from the identified high-quality projects, it will not give special consideration to a proposed project based on whether it consists of a new network build or a network upgrade.

Other factors that were considered – Type of geographic area

Positions of parties

287. Many parties submitted that the Commission should prioritize certain types of geographic areas, including unserved, Northern, rural, and/or remote areas, areas served exclusively by satellite, or areas where market forces are insufficient. Other parties proposed that funds should be allocated to serve the suburbs of densely populated municipalities.

288. Some parties argued that the Commission should not prioritize certain areas or communities over others. For example, the Government of Quebec submitted that designating priority areas is not necessary for the administration of an effective funding mechanism to respond to the broadband service needs of Canadians. The Government of Quebec added that the prioritization of certain populations or communities would establish a hierarchy, to the detriment of the Fund.

289. TCI argued that calls for applications should be open to all projects at once, without specific prioritized areas. TCI submitted that the Commission could simply give additional weight to applications from regions that it determines should be prioritized.

Commission's analysis and determinations

290. In Telecom Regulatory Policy 2016-496, the Commission indicated that one of its guiding principles was that the Broadband Fund would focus on underserved areas of Canada, which, for the purpose of the Fund, are defined as geographic areas that do not meet the universal service objective. Further, the objective of the Broadband Fund is to fund projects to build or upgrade access and transport infrastructure for fixed and mobile wireless broadband Internet access services to achieve the universal service objective. Based on the record of this proceeding, the Commission cannot conclude that certain underserved areas should be prioritized on a geographic basis over others.

291. As indicated above, however, the Commission will consider the extent of the gap between existing services and the universal service objective in the geographic areas targeted by proposed projects in its assessment of eligible projects.

292. In light of the above, the Commission determines that all eligible geographic areas will be equally eligible for funding. When selecting projects from the identified high-quality projects, the Commission will not give special consideration to a project based on the type of geographic area proposed to be covered.

What requirements should be imposed on funding recipients for selected projects?

Background

293. Once the Commission has selected a set of projects to be funded, further actions will be required to finalize and implement the selected projects, such as announcing the chosen recipients, establishing the conditions of funding, and distributing the funding to recipients.

294. Parties' submissions regarding the enforcement of conditions of funding were based on the Commission's preliminary view in Telecom Notice of Consultation 2017-112 that a third-party administrator would be responsible for (i) managing funding agreements with successful applicants, and (ii) monitoring the use of funds to ensure that funding agreements are fulfilled. In Telecom Notice of Consultation 2017-112, the Commission also suggested that it could impose a condition pursuant to section 24 of the *Telecommunications Act* on all carriers that receive funds, requiring them to complete the proposed project according to the funding agreement.

Recipient accountability and enforcement

Positions of parties

295. Only about a third of the parties that responded to Telecom Notice of Consultation 2017-112 commented on how the Commission should ensure recipients' accountability. Of those parties, most addressed the mechanisms that could be used and did not contemplate the specific conditions that could be imposed on recipients through those mechanisms.

296. Although many of the parties that commented on this issue were open to the imposition of section 24 conditions on recipients, most, including the AAMDC, Bell Canada, Blue Sky, CNOC, the CCSA-ITPA, EOWC-EORN, SaskTel, Shaw, and SWIFT, as well as the governments of Ontario and Yukon, preferred the use of funding agreements as either the sole or at least the primary mechanism for enforcement and the use of section 24 conditions as a complement to funding agreement enforcement. The Government of Nunavut supported the imposition of conditions on Broadband Fund recipients to compel them to use the funding for its intended purpose.

297. Several parties, such as the BCLC, the FMCC, and OpenMedia, argued that the Commission should rely primarily on section 24 conditions for enforcement. NPF-PIAC argued that this would result in the broadest possible range of remedies in the event of project neglect or abandonment and that section 24 conditions should be used in addition to funding agreements.

298. Some parties, including TCI, questioned the Commission's jurisdiction and the applicability of section 24 conditions on recipients. TCI argued that section 24 applies primarily to setting rates and policy for telecommunications services and that the funding agreements will not be for the provision of telecommunications services, but for the building or upgrading of infrastructure. Further, recipients may not necessarily be Canadian carriers and therefore would not be subject to section 24 conditions. RCCI disagreed, stating that projects would receive funding only if they can deliver broadband services that meet certain set standards.

Moreover, section 24.1 applies to persons that provide telecommunications services, and if a municipality or other person owns a telecommunications facility that is used by a third party to provide a service, it is a “telecommunications common carrier” under the *Telecommunications Act*.

299. Many parties, including Bell Canada, Cogeco, SaskTel, Shaw, TCI, and WPS SMART, submitted that enforcement should be dealt with through the provision of milestone or progress payments. Several parties, including the BCBA, TBayTel, and TCI, as well as the Government of Nunavut, suggested audits or site visits to ensure that projects are completed as required.

300. Parties also suggested a variety of conditions that could be imposed on funding recipients. Several parties, including EOWC-EORN, the FMCC, and NPF-PIAC, submitted that there should be ongoing requirements post-construction, with some parties advocating for a five-year term during which recipients must provide the broadband services to which they had committed. Other parties, including OpenMedia and RCCI, submitted that recipients should be required to participate in a broadband performance measurement program. SWIFT opposed such a requirement.

301. The AAMDC, the BCBA, Cogeco, Eeyou, RCCI, and SaskTel made submissions with respect to changes to projects as outlined in the initial funding application or failure to complete a project, with some parties submitting that any deviations should require the submission of an amended application. Cogeco and RCCI argued that recipients that fail to deliver the projects as proposed should be banned from subsequent calls for applications. The BCBA and the Government of Nunavut proposed a requirement to return or rebate funding that is not used.

Commission’s analysis and determinations

302. In light of the Commission’s determination above that it will be responsible for the project management function of the Broadband Fund, much of the discussion on the record related to the issues of accountability and enforcement no longer applies.

303. Instead of funding agreements, the Commission can rely on its statutory powers to impose obligations on recipients and to enforce its requirements. The Commission will adopt a multipronged approach to compliance and enforcement, which includes the imposition of obligations, reporting requirements, the distribution or withholding of funding, and the imposition of conditions on the offering and provision of broadband services pursuant to sections 24 and 24.1 of the *Telecommunications Act*.

304. Sections 24 and 24.1 of the *Telecommunications Act* provide the Commission with the broad power to impose conditions on the offering and provision of any telecommunications services by a Canadian carrier and by a person other than a Canadian carrier, respectively. These provisions can be enforced in a number of ways, including through the imposition of compliance measures, such as administrative monetary penalties (AMPs) or mandatory orders.

305. The Commission will publish in its application guide a standard list of conditions and obligations, which will apply equally to all funding recipients, regarding the construction or upgrade of proposed networks. The Commission considers that the project should not start before the date of issuance of its decision to award funding to the project (referred to hereafter as the funding decision). Although the Commission recognizes that the length of projects will vary greatly, the Commission considers that it would be appropriate for funding recipients to aim to complete their projects within three years of being awarded funding. The individual project's conditions of funding will include the project's start and end dates.
306. In addition, the Commission will set out the conditions and obligations specific to each recipient in the funding decision for the project. If the project changes materially from what the Commission had approved, the recipient must request Commission approval for such changes. Similarly, applicants will have to commit to informing the Commission should their amount of funding from any other source(s) change.
307. In light of the above, the Commission determines that funding decisions will include conditions related to project timelines, reporting, auditing, and material changes. Failure to comply with these conditions could result in funding not being disbursed until the conditions are met, or the implementation of other compliance measures.
308. The Commission will impose certain conditions, pursuant to sections 24 and 24.1 of the *Telecommunications Act*, regarding the offering and provision of broadband services using facilities funded through the Broadband Fund, such as the speed and capacity of broadband services provided, the level of retail pricing, reporting, and associated wholesale access service offerings, that would apply once the infrastructure is built. The conditions imposed on the offering and provision of broadband services will apply to the funding recipients, as well as to any subsequent purchasers of the infrastructure built with the help of funding from the Broadband Fund. In addition, the Commission may require recipients to participate in a broadband performance measurement program to enable the Commission to monitor the quality of the broadband services being provided over the funded infrastructure.

Distribution of funding and recipients' reporting requirements

Background

309. In Telecom Notice of Consultation 2017-112, the Commission noted that under the local service subsidy regime, subsidy was distributed monthly. The Commission also indicated that it expected that the distribution of funding under the Broadband Fund would differ significantly in the following ways:
- given the distinct nature of each application, it is likely that the lifespan of the projects selected will vary and that they will start and end at different times, which could lead to an uneven distribution of funding; and
 - the Broadband Fund may require fewer payouts during the year, but in large lump sums, for example, as project milestones are completed.

Positions of parties

310. The majority of parties proposed that payments should be made based on project progress or the achievement of specific milestones. Many parties, including the AAMDC, CNOC, RCCI, Shaw, and Xplornet, proposed that payments be made throughout the project life cycle, based on either the completion of explicit milestones as defined in the funding decision, or on a quarterly or annual basis as tied to project progress.
311. Parties such as Blue Sky and WPS SMART, as well as the KRG, proposed that advance payments be made to support cash flow requirements, account for seasonal build and production delays, and support small company recipients.
312. The majority of parties proposed that recipients should request reimbursement for their actual expenses incurred, which could be demonstrated through some form of supporting documentation. Most parties that supported the quarterly or annual payment distribution model suggested that recipients should formally request reimbursement for expenses incurred in the previous period or for forecasted expenses for the following period.
313. Parties such as the BCBA and the Government of Ontario also supported the use of progress payments and emphasized the importance of payment predictability and minimizing the administrative burden on recipients. The Government of Ontario recommended that the Commission not ask recipients to submit formal claims to be reimbursed, since these can place an undue administrative burden and cash flow challenges on smaller recipients.
314. SSi proposed that a few large upfront payments should be made, on no more than an annual basis, arguing that the greater the size of the payment and the earlier it can be made, the easier it will be for recipients to negotiate better pricing from suppliers.
315. Other parties such as CNOC, the FMCC, and SWIFT emphasized the importance of payment schedules that are tailored to each individual project to enable the greatest flexibility and ensure that no applicant is disadvantaged as a result of the funding distribution structure.
316. Certain parties proposed making payments upon project completion with a holdback to ensure good quality of service. Parties such as Bell Canada and NPF-PIAC suggested that payments should not be made throughout the project lifecycle, but should instead begin only upon certification of project completion, with a 25% holdback of funding for one year conditional on the fulfillment of the conditions of service, such as true speeds delivered and any prescribed quality of service indicators. NPF-PIAC suggested that community-backed projects should receive progress payments as necessary. While TCI supported the holdback approach for lower-cost and shorter-term projects, it proposed milestone or quarterly payments for longer-term projects involving relatively large amounts of money.

Commission's analysis and determinations

Distribution of funds and holdback

317. To attract and encourage innovative projects and support collaboration, the Commission considers that it should implement a funding distribution model that will not preclude any

eligible applicant from applying. Smaller applicants may not have the same level of access to credit or cash flow as larger applicants and may require funding during the project's construction phase. Accordingly, the Commission finds that a funding distribution model that provides for payment only upon project completion would not be appropriate.

318. The Commission considers that the Broadband Fund's funding distribution model should balance (i) accessibility to a wide variety of applicants and projects with (ii) mitigating the risk of project non-completion. The Commission considers that progress payments made every three months from the date of project implementation for the eligible costs incurred during the previous period would minimize the need for advance payments. Further, the reporting requirements described below will provide the Commission with the opportunity to monitor progress at regular intervals.
319. Should three-month payments not be appropriate for a recipient, it may request a less frequent payment schedule. The Commission will consider the recipient's request and determine whether an alternative payment schedule should be established.
320. To confirm that Broadband Fund recipients are fulfilling all the conditions of service outlined in the funding decision, the Commission considers that it should withhold a portion of recipients' funding amounts (i.e. a holdback). The Commission considers the use of a holdback to be an effective tool to ensure that recipients consistently provide reliable services in a timely manner and to enforce conditions of service. A holdback of 10% of project costs is typical for construction projects.
321. After one year of operation, the network should be well established, used, and tested by both service providers and subscribers. The Commission therefore considers that it should keep the holdback amount for a period of one year.
322. Accordingly, the Commission determines that under the Broadband Fund, progress payments will be made to recipients every three months from the date of project implementation, except where a less frequent payment schedule is approved by the Commission. The Commission will retain a holdback payment of 10% of the approved amount of funding for each project, which it will distribute after one year of service, once the recipient demonstrates fulfillment of the conditions of service outlined in the funding decision.

Reporting requirements

323. As noted above, in each funding decision, the Commission will also set out the conditions that each recipient will be required to meet for funded infrastructure before, during, and after the construction phase. These conditions will deal with several issues, such as timelines, reporting, auditing, material changes, and other conditions to be defined.
324. The Commission will also specify, as a condition of funding, that recipients must demonstrate their attainment of project milestones and project completion, as well as their fulfillment of the conditions of service.
325. As a condition of funding, recipients will be required to obtain Commission approval of a statement of work, which will set out in detail their project implementation plan, including

information such as key project dates and milestones. In addition, the statement of work will include specific information about the project, such as a logical network diagram, a network description, project sites, equipment details, a project schedule, and estimated project costs. Recipients will be required to file the statement of work for Commission approval before project construction can begin.

326. To determine the amount of payment to be made every three months, recipients will be required to file a claim that has been certified by their chief financial officer (CFO) or CFO-equivalent, with supporting documentation (invoices, receipts, etc.) for the eligible costs incurred. The format of this claim will be set out in the application guide. Recipients will also be required to demonstrate that all the costs claimed have been paid and are related to the activities described in the project plan and the estimated budget in the funding decision.
327. Each claim must be accompanied by a progress report outlining details such as the project's implementation status and an update on the project's costs. The submission of funding claims and progress reports every three months will enable the Commission to monitor project implementation. In cases where a progress report demonstrates a material change from the statement of work for the project as approved by the Commission, the Commission may withhold payment(s) until the deficiency is corrected to the Commission's satisfaction. The Commission may, where appropriate, request that any related report, form, or documentation be certified by the recipient's external auditor or by an auditor approved by the Commission.
328. Once the project is complete and broadband services are offered, the Commission determines that recipients will be required to file a report that will provide details of the completed project, such as whether the project meets the conditions set out in the funding decision, as well as any project delays, service uptake, and open access requests.
329. For the Commission to disburse the holdback portion of funding, recipients will submit a report demonstrating that they have met all the necessary conditions of service. Conversely, if certain conditions have not been met, the Commission may withhold funding until the recipient can demonstrate compliance. The Commission may, where appropriate, request that this report be certified by the recipient's external auditor or by an auditor approved by the Commission.
330. Recipients will also be required to preserve and make available (upon request), for audit purposes, all books, accounts, and records of the project; their administrative, financial, and claim processes and procedures; and any other information necessary to ensure compliance with the terms and conditions of the funding decision for a period of eight years from the project completion date. The Commission may conduct periodic audits to verify whether a funding recipient is in compliance with the terms and conditions established in the funding decision.
331. The Commission determines that funding recipients will be subject to reporting requirements as generally described above and that further details with respect to specific reporting requirements will be provided in the future.

Ownership and sale of funded assets

Background

332. In Telecom Notice of Consultation 2017-112, the Commission indicated that it would examine what requirements, if any, should be imposed on public sector entities regarding the ownership of assets constructed with the support of the Broadband Fund.

Positions of parties

333. In the context of this issue, some parties made submissions with respect to whether there should be requirements on when a public sector entity will be able to sell the assets. In addition, some parties raised questions with regard to a change in ownership in funded infrastructure, regardless of whether the original infrastructure owner was a public sector entity.

334. The BCBA submitted that public sector entities should be allowed to sell assets with no restrictions. Galaxy argued that communities should be able to sell satellite assets. The Government of Yukon submitted that it is not clear how any such requirements would operate or what objective would be achieved by this restriction.

335. 3C Information Solutions Incorporated argued that public sector entities should not be allowed to sell assets, but that they could lease them to other organizations. The NEFC submitted that public sector entities should not be allowed to own or operate broadband infrastructure for retail service delivery and must find other ways to support building the capacity of local private sector companies. The FMCC proposed that in cases where public funds are used to support a percentage of a project, the entity should retain that level of ownership.

336. Many parties, including Bell Canada, CCI, CNOC, NPF-PIAC, and TBayTel, as well as the governments of British Columbia and Ontario, submitted that as long as the subsequent purchaser honours the funding recipient's obligations and broadband services continue to be provided, no additional ownership requirements should be placed on public sector entities. CANWISP, the CBBC, Galaxy, RCCI, and Rothschild suggested that the Commission approve any potential sales. Other parties, including Cybera, EOWC-EORN, and the Government of Ontario, proposed that if parties wish to sell assets before the end of the minimum operating period, the Commission could establish an amortization period or a repayment schedule.

337. Blue Sky, Eeyou, and the KRG supported a framework in which applicants retain ownership of assets for a set period, and maintain and upgrade the network during that period as needed. The Government of Nunavut suggested that assets not be sold or transferred in cases where doing so would disrupt or discontinue broadband service delivery at the level committed to in the application. CANWISP proposed that assets should become recipients' property at the end of a specified delivery term, provided that the conditions that were committed to have been delivered; however, prior to that specified date, the sale of the assets should require the approval of the third-party administrator.

Commission's analysis and determinations

338. There is no evidence on the record of this proceeding to suggest that the sale of funded assets is an issue particular to public sector entities or that public sector entities should be required to make additional commitments. Accordingly, the Commission determines that it will not place any additional requirements on public sector recipients beyond those required of private sector recipients.
339. With respect to the concern raised about subsequent purchases of funded infrastructure, any conditions imposed by the Commission pursuant to sections 24 and 24.1 of the *Telecommunications Act* will apply to the offering and provision of broadband services by the funding recipients, as well as by any subsequent purchasers of the infrastructure built with the help of funding from the Broadband Fund. Thus, even if the recipient were to sell the funded assets, the potential purchaser would be required to continue to adhere to the conditions that the Commission has imposed on the offering and provision of broadband services using those funded assets. Consequently, there would be no benefit to requiring Commission approval of potential purchasers.
340. Accordingly, the Commission determines that it is neither necessary nor appropriate to require its approval of the purchase and sale of funded infrastructure.

How will projects for satellite-dependent communities be evaluated and selected?

Background

341. In Telecom Regulatory Policy 2016-496, the Commission noted that many Canadians who depend on satellite services for some or all of their telecommunications needs are located in some of the nation's most remote areas, where terrestrial transport facilities are minimal or non-existent. In particular, satellite-dependent communities present a challenge to connect terrestrially due to significant costs, lack of roads, harsh terrain, and short construction seasons. The Commission added that the Government of Canada has provided and continues to provide funding to expand broadband Internet access service in satellite-dependent communities. However, this funding is insufficient to provide these communities with adequate terrestrial transport infrastructure to achieve the broadband portion of the universal service objective. Connecting these communities using terrestrial transport facilities requires a collaborative approach with all stakeholders and the development of an action plan to pay for the necessary infrastructure costs. The Commission stated that, in the interim, the Broadband Fund would also support these communities in improving their broadband Internet access services.
342. The Commission therefore determined that, to ensure that satellite-dependent communities are supported by the Broadband Fund, up to 10% of the Fund's total annual limit would be allocated to satellite-dependent communities for the first five years of the Fund's operation. The Commission indicated that this funding is intended to support operational costs and, potentially, certain related capital costs.
343. The Commission also set out the following preliminary view on eligible costs for the satellite component of the Broadband Fund: For satellite-dependent communities, eligible costs are

the costs associated with improving the speed, capacity, and quality of broadband Internet access services in the community. These eligible costs will include those for the main component of the Fund, as well as satellite capacity and equipment costs, such as the portion of the direct purchase or lease of bandwidth or capacity, modems, satellite links, and any other costs directly related to building and maintaining earth stations.

344. Most parties did not comment on the satellite component of the Broadband Fund.

How should a satellite-dependent community be defined?

Background

345. In Telecom Notice of Consultation 2017-112, the Commission set out to examine the implementation of the satellite component of the Broadband Fund and how to define a satellite-dependent community for the purpose of the Fund. As an example, the Commission referred to the definition used in its 2014 [Satellite Inquiry Report](#) (the Report), which defined a satellite-dependent community as “a community that has no connection to terrestrially based telecommunications facilities for connection to the public switched telephone network (PSTN) and/or the Internet, and that relies on satellite transport to receive one or more telecommunications services (such as voice, wireless [both fixed and mobile], and Internet services).” The Report identified approximately 90 communities that rely on satellite transport to access broadband Internet access services in Canada.

Positions of parties

346. In general, parties that commented on the satellite component agreed with the definition of a satellite-dependent community that the Commission provided in Telecom Notice of Consultation 2017-112.

Commission’s analysis and determinations

347. The Commission considers it important to define satellite-dependent communities to differentiate them from households that use DTH satellite access, since satellite-dependent communities (i) are remote, (ii) generally use a community aggregator access model,¹⁶ and (iii) depend on satellite transport capacity for their telecommunications services. The Commission confirms that for the purpose of the Broadband Fund, the definition proposed in Telecom Notice of Consultation 2017-112, taken from the Report, is appropriate.

348. Accordingly, the Commission determines that, for the purpose of the Broadband Fund, a satellite-dependent community is a community that has no connection to terrestrially based telecommunications facilities for connection to the PSTN and/or the Internet, and that relies on satellite transport to receive one or more telecommunications services (such as voice, wireless [both fixed and mobile], and Internet services).

¹⁶ In the community aggregator access model, capacity is transported via satellite to a community earth station, which is connected to a local access distribution network. This network provides individual households, businesses, and government buildings with access to broadband Internet access service.

Should proposed projects for satellite-dependent communities be evaluated separately?

Positions of parties

349. Blue Sky and RCCI submitted that proposed projects covering satellite-dependent communities should not be treated differently than proposed projects covering rural and remote areas, and that no specific implementation strategy should be developed for the former type of proposed projects. The BCBA, the FMCC, the NEFC, and OpenMedia submitted that the Commission should focus on building fibre networks where possible instead of subsidizing satellite broadband Internet access service.

350. Bell Canada, EOWC-EORN, the FCM, and NPF-PIAC, as well as the Government of the Northwest Territories, advocated for a specific competitive component for proposed projects covering satellite-dependent communities. These parties stated that, given the specific nature of retail satellite services and the remoteness of satellite-dependent communities, a specific strategy is necessary to assess proposed projects covering satellite-dependent communities against each other.

Commission's analysis and determinations

351. In Telecom Regulatory Policy 2016-496, the Commission determined that up to 10% of annual funding under the Broadband Fund will support satellite-dependent communities, to ensure that projects are initiated in these communities and that funding is provided to them. However, the Commission estimates that this limit is not sufficient to fund transport projects over the distances needed to bring fibre to many satellite-dependent communities.

352. A number of criteria, such as scalability, efficient use of funds, and speeds, cannot be reasonably compared between the broadband Internet access service provided via terrestrial facilities (e.g. fibre) in urban areas and such service provided via satellite due to the distances involved and limitations of satellite technology. Accordingly, the Commission considers that proposed projects covering satellite-dependent communities should be evaluated separately so that such projects can be compared against each other.

353. In light of the above, the Commission determines that it will implement a specific evaluation process for proposed projects covering satellite-dependent communities. If the amount of funding requested for high-quality projects covering satellite-dependent communities in a given year is less than the total allocation amount of 10% of the Broadband Fund for that year, any excess amount may be used to fund projects in other eligible geographic areas.

What types of projects for satellite-dependent communities should be considered?

Positions of parties

354. Bell Canada and SaskTel indicated that meeting the universal service objective through projects covering satellite-dependent communities may not be feasible. Instead, Bell Canada proposed 15-Mbps download and 2-Mbps upload speed eligibility criteria, as well as a 100-gigabyte capacity criterion. The BCBA submitted that speed criteria of 10 Mbps

download and 1 Mbps upload would be appropriate for projects covering satellite-dependent communities.

355. RCCI and the Government of Quebec stated that there should be no minimum standard for projects covering satellite-dependent communities, since any improvement in satellite service offerings would be a good step forward. The NEFC advocated for one standard for broadband Internet access service offerings for all Canadians; however, it recognized that there is currently not enough satellite capacity to deliver broadband Internet access service at the levels set out in the universal service objective.

356. Shaw, SSi, TCI, Telesat, and Xplornet supported the principle of technological neutrality in project assessment. They submitted that the speed and quality of service criteria applied to other projects should be applied to projects covering satellite-dependent communities. Xplornet submitted that it is likely that in five years, satellite technology will provide services at levels that exceed those set out in the universal service objective. Telesat further noted that low-earth orbit (LEO) satellites, which it is authorized to launch, will be capable of offering the same speed, capacity, and latency service standards as those applicable to terrestrial networks. However, Bell Canada submitted that at this time, all potential future developments in technologies such as LEO satellites and Ka-band satellites remain entirely prospective.

357. RCCI, SaskTel, and Telesat, as well as the Government of Quebec, submitted that the Commission should focus its Broadband Fund on emerging technologies, such as LEO constellations, to provide broadband services to satellite-dependent communities. SWIFT added that subsidizing old technologies used to offer retail satellite services would prevent technological breakthroughs in satellite-dependent communities.

Commission's analysis and determinations

358. While it is possible to provide broadband services in satellite-dependent communities using the geostationary earth orbit (GEO) satellites that are currently in service, these satellites introduce an inherent latency, making them unsuitable for providing high-quality broadband services that meet the criteria established to measure the successful achievement of the universal service objective.

359. LEO satellites are expected to deliver high-quality broadband Internet access services in the future; however, it will take time to (i) test the level of service that LEO satellites will be able to provide to their subscribers, and (ii) fully deploy this technology. The Commission therefore concludes that it is not appropriate to expect proposed projects covering satellite-dependent communities to provide service at universal service objective targets at this time.

360. The Commission considers that the three following types of projects should be considered under the satellite component of the Broadband Fund:

- Projects to increase satellite transport capacity (operational costs only): applications for funding to cover operational costs annually, over a certain amount of time, to increase satellite transport capacity in a satellite-dependent community

- Infrastructure projects: applications for capital funding to be invested in the earth station equipment and access infrastructure in a satellite-dependent community to improve broadband Internet access service
- Infrastructure projects and operational costs: applications for a combination of capital funding for infrastructure and funding for satellite transport operational costs in a satellite-dependent community

361. If a terrestrial transport network is built in the vicinity of a satellite-dependent community, and an applicant proposes an access infrastructure project to connect to this new transport network, the satellite-dependent community would no longer be dependent on satellite transport. Accordingly, the Commission determines that such projects will be evaluated under the main component of the Broadband Fund and will not be restricted to the annual 10% funding limit for projects under the satellite component.

Eligibility criteria

362. The Commission has reviewed the eligibility criteria under the main component of the Broadband Fund to determine whether they should also apply under the satellite component. The Commission considers that while some criteria should apply under both components, others should be modified or removed for the satellite component.

363. Based on its review, the Commission determines that the eligibility criteria set out above for the main component of the Fund regarding eligible applicants (paragraphs 119 and 120), project viability (paragraph 129), applicant investment (paragraph 147), and community consultations (paragraph 223) should also apply to projects proposed under the satellite component of the Broadband Fund.

364. Further, the Commission determines that projects proposed under the satellite component of the Broadband Fund must also meet the following eligibility criteria:

- the project covers an eligible geographic area that is a satellite-dependent community, as defined above;
- the project is for operational costs and/or is an infrastructure project to improve earth stations and access infrastructure;
- the applicant offers competitive retail pricing for reasonably comparable speed and capacity packages, including affordable packages whose prices are the same as or lower than those offered in Iqaluit, Nunavut; and
- the eligible costs are
 - associated with improving the speed, capacity, and quality of broadband Internet access services in a satellite-dependent community; and
 - limited to (i) those set out in the list of eligible costs for the main component, and (ii) satellite capacity and equipment costs, such as costs for the direct purchase or

lease of bandwidth or capacity, modems, and satellite links, and any other costs directly related to building and maintaining earth stations.

365. As discussed above, the Broadband Fund will not cover operational costs to run infrastructure built as a result of the project. However, the Fund will cover ongoing training costs in the first year of operation of the network for projects that cover communities without year-round road access.

Assessment criteria and selection considerations

366. The Commission considers that, in general, eligible applications under the satellite component should be evaluated based on the same assessment criteria as eligible applications under the main component, as set out above. However, given the limited subscriber base in satellite-dependent communities and the remoteness of these communities, the Commission considers it unlikely that proposed projects would increase the available level of broadband Internet access service coverage. Accordingly, level of coverage will not be used as an assessment criterion for projects proposed under the satellite component.

367. Consequently, the Commission determines that the assessment criteria set out above regarding (i) technical merit (paragraph 231), (ii) financial viability (paragraph 232), (iii) community consultations and level of involvement (paragraph 233), (iv) level of funding from other sources (paragraph 234), (v) current gap with respect to the availability of universal service objective-level services (paragraph 235), (vi) proposed level of service (paragraph 236), (vii) cost per household (paragraph 238), and (viii) retail service pricing and offers (paragraph 239), will also apply to the assessment of projects proposed under the satellite component.

368. The Commission also determines that when selecting projects for funding, it may take into account the same special considerations as those set out above under the main component of the Broadband Fund.

How should funding be distributed?

Positions of parties

369. Parties generally focused their comments on the distribution of funding for infrastructure projects as opposed to the distribution of funding for satellite operating costs. The BCBA and CANWISP submitted that ongoing funding should be paid quarterly until the end of the project term.

Commission's analysis and determinations

370. The Commission considers that it would be administratively efficient to distribute funding for operational costs under the satellite component of the Broadband Fund every three months, consistent with the main component. The Commission has been provided with no compelling evidence to indicate why more frequent payments would be necessary.

371. To receive payments, a funding recipient will be required to submit a claim with proof of payment for eligible satellite transport operating costs. The Commission will announce the amount to be distributed in each three-month payment in its funding decision.
372. The Commission considers that funding for eligible capital costs for infrastructure projects from the satellite component should be distributed in accordance with the funding distribution model for the main component of the Broadband Fund, as set out above.
373. In light of the above, the Commission determines that funding under the satellite component of the Broadband Fund for satellite operating costs will be distributed to recipients every three months, unless otherwise requested, upon receipt of the recipient's claim with proof of payment.

What are the expected follow-up activities and next steps?

Eligibility maps

Commission's analysis and determinations

374. To identify the geographic areas that may be eligible for funding, the Commission will publish maps displaying (i) eligible hexagons for fixed broadband Internet access service projects, (ii) eligible communities for transport projects, and (iii) eligible hexagons and major transportation roads for mobile wireless service projects. These maps will be based on data provided by the industry and the definitions of eligible geographic areas set out above for fixed broadband Internet access service projects, transport projects, and mobile wireless service projects. The Commission will also publish a list of eligible satellite-dependent communities.
375. Concurrently with its call for applications, the Commission will publish eligibility maps that are consistent with the scope of the call.

Application guide

Commission's analysis and determinations

376. All the information that applicants will need to apply for funding will be published in an application guide. The guide will provide a description of each assessment criterion. The guide will also provide procedural and practical details, such as filing deadlines and instructions on how to fill out the application forms.
377. The Commission considers that enabling applicants to familiarize themselves with the application guide prior to issuing a call for applications would provide potential applicants, as well as communities and individuals that might benefit from funded projects, with an opportunity to thoroughly understand the application process and the process that will be followed to evaluate applications. It would also provide an opportunity for the public to pose questions of clarification regarding these processes.
378. Accordingly, the Commission determines that prior to the first call for applications, it will publish a preliminary application guide so that the public can better understand the

application process and interested persons will have an opportunity to provide comments. Following this consultation, the Commission will publish, concurrently with its call for applications, a final application guide that is consistent with the scope of the call.

Call(s) for applications

Background

379. In Telecom Regulatory Policy 2016-496, the Commission established the amounts that would be collected and distributed for the first five years of the Broadband Fund, but did not specify whether they would be allocated through a single call for applications or multiple calls. In its preliminary view set out in Telecom Notice of Consultation 2017-112, the Commission indicated that, given that each call for applications is resource-intensive and administratively complex, the initial call for applications should span multiple years of funding. It added that this would give the administrator for the project management function the flexibility to consider both large, multi-year projects and smaller ones, while respecting the funding cap in any given year.

Positions of parties

380. Parties submitted a range of proposals on this issue, from continuous open calls to a single call over the initial five-year period.

381. Cybera, OpenMedia, SWIFT, and TBayTel supported either continuous open calls or multiple calls throughout the year to give a wider range of potential applicants the opportunity to apply for funding. Bell Canada, CANWISP, CCI, the CCSA-ITPA, Eeyou, the FMCC, NPF-PIAC, and TCI, as well as the governments of British Columbia, Nova Scotia, Nunavut, and Ontario, supported yearly calls, or even calls every six months, to enable the selection of a wide array of projects, learning from experience, and adaptation to changing needs and technological developments.

382. However, Xplornet submitted that since infrastructure programs typically take one to two years to implement, and another year to assess consumer response and adoption, the Commission should undertake no more than two calls for applications over the initial five-year period. Other parties, such as the AAMDC, CNOC, Cogeco, DERYtelecom, the FCM, Galaxy, RCCI, Rothschild, Shaw, SSI, and Videotron, as well as the governments of Alberta and Manitoba, and the KRG, supported the proposal to have a call for applications every two to three years, or two calls for the first five years. According to these parties, this frequency would strike the appropriate balance between accounting for change and administrative efficiency, while allowing for process improvements between calls.

383. Blue Sky, Eastlink, and SaskTel supported a single call for applications over the first five years of the Broadband Fund, because it is resource-intensive, time-consuming, and complex for applicants to develop their proposed projects. However, many parties were opposed to a single call, stating that this would hinder the ability for applicants to amend their proposed projects or develop proposed projects for different geographic areas. Some parties also suggested that a single call for applications would favour big, multi-year projects as opposed

to small community ones. Other parties stated that the selection of all projects to be funded at once would run the risk of proposed projects becoming dated or no longer valid.

Commission's analysis and determinations

384. The Commission considers that a continuous open call for applications, in which applications could be submitted at any time, would be nearly impossible to administer using a comparative selection approach. If applications could be submitted at any time, it would be difficult for the Commission to know when to start selecting from the identified subset of high-quality projects for funding.

385. The process that the Commission will use to select the most appropriate proposed projects will require some time to complete, similar to the process it uses to analyze a proceeding stemming from a Part 1 application or a notice of consultation. It would therefore be difficult for the Commission to implement annual calls for applications at this time, since it is likely that a new call would have to be issued before the funded recipients of the previous call would start implementing their projects. This would make it difficult for the Commission to make improvements from call to call and to plan to meet future needs.

386. The Broadband Fund does not currently cover a defined time period. In Telecom Regulatory Policy 2016-496, the Commission established incremental funding amounts for the first five years of the Fund, but the Fund does not have a set end date. The Commission must therefore retain flexibility to meet future needs. Accordingly, the Commission considers that the best approach would be to issue at least one call for applications, and possibly subsequent calls, during the first five years of the Fund.

387. The determination of whether or not to issue subsequent calls for applications during the first five years of the Fund will depend on many factors related to the first call for applications, such as the number of applications received, the amount of time required to administer the previous call and for funded projects to start being implemented, the type and length of projects selected, coordination with other government programs as needed, and the third-year review of the Fund.

388. In addition, the Commission can limit the scope of a call for applications by calling for only specific types of projects or by making only certain areas eligible for funding on a per-call basis, if the Commission considers it necessary or efficient. Any deviations from the eligibility criteria stated in this decision that apply to a particular call for applications will be clearly indicated in that call, the application guide, and the eligibility maps if applicable.

389. In light of the above, the Commission determines that it will issue an initial call for applications and may issue subsequent calls during the first five years of the Broadband Fund. As stated above, eligibility maps and an associated application guide will be published concurrently with each call.

Fund performance measurement and accountability

Fund performance

Commission's analysis and determinations

390. The Commission considers it important to publish reports on the performance of the Broadband Fund, including an aggregated report on the effectiveness of funded projects. The Commission considers that it should also provide an update on broadband networks in Canada, as well as whether these networks deliver services that achieve the universal service objective (e.g. the percentage of households where universal service objective-level fixed broadband Internet access service is available).
391. Accordingly, the Commission determines that it will report on the performance of the Broadband Fund on an annual basis, and that this report will be published on the Commission's website and/or as part of its *Communications Monitoring Report*.
392. Furthermore, the Commission confirms that, as stated in Telecom Regulatory Policy 2016-496, it intends to conduct a review of the Broadband Fund in the third year to ensure that the Fund is efficiently achieving its intended purpose. The incremental increases in years four and five, which have a combined value of \$75 million, will be contingent on the results of this review.

Fairness monitor

Background

393. In Telecom Regulatory Policy 2016-496, the Commission determined that the appropriate structure and safeguards for the administration of the Broadband Fund would be put in place to ensure that the Fund is operated fairly and efficiently. One such safeguard was the involvement of a fairness monitor, which was defined as an independent, external party that observes all or part of a competitive process and provides an unbiased and impartial opinion on the fairness of that process.

Positions of parties

394. Parties such as RCCI, SSI, and the governments of Nunavut and Ontario supported the involvement of a fairness monitor. Some parties, such as CANWISP and the Government of Nunavut, submitted that the fairness monitor should act as an ombudsperson by responding to complaints from applicants and participants. Other parties, such as the BCBA, proposed that the fairness monitor should conduct follow-ups to ensure that (i) the objective of the Broadband Fund is achieved, (ii) there is no adverse effect on competition, and (iii) the administrative burden has not precluded participation. Additional parties, such as Cybera, proposed that the fairness monitor should formally document opinions on the fairness of the process.
395. Certain parties, such as Shaw, TCI, and Xplornet, questioned the need for a fairness monitor. TCI argued that publication of the assessment criteria in advance, with an explanation of why the criteria were selected, would suffice, and that a fairness monitor would be an inefficient

and disproportionate use of resources. Shaw indicated that if the Commission assumed the project management function, there would be no need to devote resources to a fairness monitor.

Commission's analysis and determinations

396. The Commission's determination in Telecom Regulatory Policy 2016-496 that a fairness monitor should be appointed was based on the assumption that an independent third party would be responsible for the project management function of the Broadband Fund.

397. Given the Commission's determination that it will be responsible for the project management function, rather than an independent third party, the appointment of a fairness monitor is no longer necessary. Given (i) the proceeding to date, (ii) the publication in advance of an application guide that sets out the process to follow and the eligibility and assessment criteria, as well as (iii) the publication of funding decisions, the Commission considers that it has designed a transparent, open, and procedurally fair process to award funding.

398. A funding decision may be subject to a review and vary application. The Commission considers, however, that to ensure the proper administration of the Broadband Fund and not needlessly delay the implementation of projects selected for funding, it may expedite the review and vary process, such as by reducing the time limit for filing such an application. Any deviations from the Commission's guidelines for review and vary applications will be set out in the application guide.

399. In light of the above, the Commission determines that a fairness monitor is not required.

Confidentiality

Background

400. Discussion of confidentiality on the record of the proceeding was based on the Commission's preliminary view set out in Telecom Notice of Consultation 2017-112 that information collected by the Commission may have to be shared with the third-party administrator for the project management function, including information designated confidential pursuant to section 39 of the *Telecommunications Act*.

Positions of parties

401. Based on the Commission's preliminary view that a third-party administrator would be managing funding agreements, a few parties, including Bell Canada and the Government of Nova Scotia, argued that confidentiality should be dealt with in those funding agreements. Both Cogeco and Shaw argued that if the Commission were to assume the project management function, it would simplify the issue of confidentiality.

402. Many parties, including CANWISP, the CBBC, CNOC, Cybera, EOWC-EORN, NPF-PIAC, and SWIFT, as well as the Government of Yukon and the KRG, submitted that section 39 of the *Telecommunications Act* should apply to the Broadband Fund in the same manner as it does to any other Commission proceeding. Other parties, including Eastlink, Eeyou, SSI, and

Xplornet, as well as the Government of Nunavut, proposed a regime that closely resembles section 39. These parties discussed the need to balance the safeguarding of commercially sensitive information with the need to disclose certain information to the public. However, parties were open to allowing the Commission to disclose some information, as long as the type of information to be disclosed is clearly established beforehand. Xplornet submitted that initial applications should be made confidentially.

403. The CTCC submitted that it is essential that amounts paid to recipients, the names to which and the dates on which payments are to be made, as well as other relevant information, be clearly communicated in writing to the Central Fund Administrator. Bell Canada agreed that the same type of contract confidentiality provisions that are currently used by the CTCC could be applied to confidential information provided to the accounting entity of the Broadband Fund.

Commission's analysis and determinations

404. As set out above, the role of the third-party administrator of the Broadband Fund will be to collect monies from telecommunications service providers and distribute funding to recipients identified by the Commission. As submitted by the CTCC, the only information the administrator will need is the names of recipients, the amounts to be paid, and the dates of those payments. This information is unlikely to raise any of the confidentiality issues contemplated by the Commission in Telecom Notice of Consultation 2017-112 or by parties in their interventions.

405. Accordingly, the issue of confidentiality will not arise in the context of sharing information with a third-party administrator, but, rather, will be governed by Commission procedures. In general, the Commission posts applications on its website, subject to any confidentiality claims under section 39 of the *Telecommunications Act*. The Commission expects that most of the information in applications for funding would be confidential commercial or financial information for which the Commission would typically uphold confidentiality.

406. In addition, the Commission considers that public disclosure of unsuccessful applications – for example, the identity of applicants and the area(s) for which funding was sought – could result in harm to applicants, given that it would divulge their expansion strategy. Further, unsuccessful applicants may wish to reapply for funding in a subsequent call for applications.

407. Given the extent to which a proposed project will likely be confidential, the opportunity for public comment on such projects will be limited. Moreover, the Commission considers that the usefulness of public input at the application stage will be minimal given that the Commission will apply pre-established, published criteria. The public will have the opportunity to extend support for a given application, since community consultation and support is required at both the eligibility and assessment stages.

408. In light of the above, the Commission determines that applicants will be permitted to file their applications confidentially, and that no public process will be initiated in respect of funding applications.

409. The Commission considers that once funding decisions are made, the confidentiality of certain information pertaining to the selected projects will no longer be justified, and that such information will need to be included in its published funding decisions to ensure the transparency of these decisions. For instance, the Commission expects that the following information may be published: the funding recipient, the number of households that will be served, the amount of funds awarded, the geographic area(s) of the project, the technology implemented, and the assessment criteria that supported the selection of the particular project.
410. In addition, as discussed above, recipients will be required to submit information in periodic reports. The Commission may use some of this information in aggregate form to publicly report on, for example, the number of households connected as a result of the Broadband Fund, which geographic areas have universal service objective-level coverage, the amount of funding disbursed to date, and the progress of projects.
411. Details with respect to information that will generally be kept confidential and information that will be made public at various stages (i.e. in funding decisions, reports to be filed by recipients, and reports filed as part of Commission monitoring) will be set out in the application guide.

Secretary General

Related documents

- *Call for comments – Establishment of an appropriate quality of service metric for jitter to define high-quality fixed broadband Internet access service*, Telecom Notice of Consultation CRTC 2018-242, 13 July 2018
- *CISC Network Working Group – Non-consensus report on quality of service metrics to define high-quality fixed broadband Internet access service*, Telecom Decision CRTC 2018-241, 13 July 2018; as amended by Telecom Decision CRTC 2018-241-1, 3 August 2018
- *Phase-out of the local service subsidy regime*, Telecom Regulatory Policy CRTC 2018-213, 26 June 2018
- *Canadian Telecommunications Contribution Consortium Inc. – Application to revise the Procedures for the Operation of the National Contribution Fund, effective 15 February 2018*, Telecom Decision CRTC 2018-60, 14 February 2018
- *Development of the Commission’s broadband funding regime*, Telecom Notice of Consultation CRTC 2017-112, 25 April 2017; as amended by Telecom Notice of Consultation CRTC 2017-112-1, 24 July 2017
- *Modern telecommunications services – The path forward for Canada’s digital economy*, Telecom Regulatory Policy CRTC 2016-496, 21 December 2016
- *Regulatory framework for wholesale mobile wireless services*, Telecom Regulatory Policy CRTC 2015-177, 5 May 2015