Background
It is well accepted that there is a causal relationship between tobacco use and a variety of different cancers (e.g., lung, head, neck). Indeed, tobacco use has been estimated to be responsible for approximately 30% of annual cancer deaths in the US. Moreover, cessation of tobacco use can lead to a variety of positive health outcomes (including a reduced risk for cancer). There is also a substantial medical advantage to quitting smoking once cancer is diagnosed, because quitting has been shown to improve the prognosis of cancer patients, whereas smoking is associated with higher all-cause and cancer-specific mortality and is a risk factor for recurrence, poorer response to cancer treatment, and increased treatment-related toxicity. Poorer health outcomes are found for cancer patients who use tobacco products, including lower survival rates and increased risk of a second malignancy. Despite the clear benefit of cessation among cancer patients, it remains a challenge for cancer patients to engage in cessation activities, particularly for those with co-morbid conditions, including mental health or substance abuse conditions. Importantly, evidence-based cessation treatments found to be effective for patients who smoke in general have been found to be effective in virtually every patient subpopulation evaluated. As such, these evidence-based treatment interventions should be part of the basis of proposed cancer center tobacco cessation treatment program proposals.

Many cancer patients receive their oncological care at cancer centers, making these centers an ideal setting for a tobacco cessation intervention program targeted at persons diagnosed with cancer. However, a multitude of challenges, faced by both patients and cancer centers, exist in treating tobacco use among cancer patient populations. These challenges include, but are not limited to, time constraints for patient interactions with the oncologist and medical team, costs, the complexity of clinical care requirements and its effects on integrating a cessation program into care, fear of medications (for both providers and patients), lack of training in proper tobacco cessation methodologies, reluctance by patients to quit smoking, billing constraints, IT challenges around integration into electronic health records and other workflow systems, lack of evidence on treating tobacco dependence among cancer patient populations (e.g., dealing with fatalism, specific benefits, urgency of quitting), and the complex nature of insurance coverage for tobacco cessation treatment. Despite these challenges, some cancer centers have successfully developed cessation programming and integrated cessation treatment services into their care practice workflows. While much work needs to continue in this area, the importance of such integrated cessation care that optimizes patient outcomes is critical. With this funding, NCI seeks to leverage the expertise and innovation of cancer centers to tackle these challenges and establish robust cessation programs that continue far beyond the period of this supplemental funding.

The Cancer Moonshot-funded Cancer Center Cessation Initiative (C3I) was launched in the FY17 when an initial cohort of 22 NCI-designated cancer centers were awarded two years of funding. In the FY18, a second cohort of 20 cancer centers began their two years of funding, resulting in a total of 42 centers selected for support.

Purpose and Goals
The National Cancer Institute (NCI), Division of Cancer Control and Population Sciences (DCCPS), announces the opportunity for supplemental funding for NCI-designated cancer centers to develop or enhance tobacco cessation treatment capacity and infrastructure for cancer patients that will lead to the implementation and dissemination of a sustainable tobacco cessation treatment program within the cancer center.

The primary goal of this funding opportunity is to increase capacity to address the tobacco cessation needs of cancer patients. The purpose of this opportunity is to provide resources to support the time
and effort of teams at NCI-designated cancer centers who will plan, implement, evaluate, and sustain a comprehensive tobacco cessation program for cancer patients, including finding ways to determine and then address the variety of implementation challenges through pilot research programs. Awardees will be expected to seek to integrate these treatments into existing cancer center clinical services and workflows and continue to support dedicated resources/staff for the program (e.g., cessation counselors, trained personnel).

To be considered for supplemental funding, any proposed tobacco cessation treatment program must incorporate an initial assessment/screening of tobacco use of all patients, provision of smoking cessation medications (as appropriate), provision of evidence-based cessation materials, counseling, referral to appropriate external cessation resources (state quit line, smokefree.gov), regular follow-up support, and evaluation/monitoring of patient progress throughout their quit attempt. Importantly, the application should demonstrate that the proposed clinical programs take a population-based approach – that the tobacco use status is assessed and documented for every cancer center patient and that there are plans in place to deliver some component of evidence-based treatment (cessation treatment for those willing to make a quit attempt and motivational treatments for those not willing to make a quit attempt now) to every patient who uses tobacco. One means of taking such a population-based approach is to utilize the electronic health record at the cancer center as a tobacco user registry to identify which patients to target for intervention. Applicants who propose development or delivery of a cessation program that is not consistent with the minimum elements of a program, as described above, will be considered nonresponsive.

Investigators are strongly encouraged to use standard data collection measures for tobacco use screening, use of services, cost per patient, program reach, and cessation outcomes. The Institute of Medicine report entitled “Capturing Social and Behavioral Domains in Electronic Health Records,” the Cancer Patient Tobacco Use Questionnaire (C-TUQ, see https://cancercontrol.cancer.gov/brp/tcrb/tobacco-after-cancer-diagnosis.html), and other consensus documents and resources should be reviewed for relevant measures.

Eligibility

- Only one supplement request per center will be considered.
- The project period is for one year.
- Cancer centers whose P30 Cancer Center Support Grant will be in an extension at the time the award is made in FY20 are not eligible for this supplement.
- It is anticipated that awards for this supplement opportunity will be made in September 2020.
- **C3I Enhancement Program**: The 42 existing C3I cancer center grantees (Cohort 1 and 2) will be allowed to apply for new funding. The focus is on expanding reach and effectiveness. This includes continued engagement with other grantees (attendance at biannual meetings), reporting on reach and effectiveness biannually to the coordinating center, and development/implementation EHR-based systems that automate this reporting. Projects must include a pilot study to test a new strategy to increase reach and effectiveness. Supplement requests may not exceed $200,000 total costs per year for one year. A commitment of matching funds from the Cancer Center is desirable.
- **C3I Expanded Sites Program**: Cancer centers that did not previously receive C3I funding will be eligible to receive up to $400,000 per year for one year.

Application Submission Format

Applications should be submitted as a signed, scanned PDF to Stephanie Land (stephanie.land@nih.gov) and Stacey Vandor (stacey.vandor@nih.gov) no later than COB May 4, 2020.

Email confirmation of application receipt from Stacey Vandor must be obtained to be officially considered and evaluated.

Requests must include the following:
The 5-page summary must:

- Specify whether the application is for the Enhancement or Expansion Program.
- Provide a statement that explains the need for a tobacco cessation program in the cancer center, including the prevalence of tobacco use among patients.
- Provide a background statement on any existing tobacco cessation services or resources offered in the cancer center, any staff expertise in tobacco cessation, and how current cessation offerings will be expanded or incorporated into a new program for this effort. Applicants to the Enhancement Program should describe the progress that was accomplished under the awarded C3I supplement.
- For Enhancement Program applications, describe the pilot study design.
- For Expansion Program applications, describe the process that the lead staff member of the tobacco cessation program will use to identify the appropriate framework, incorporate strategies to address the tobacco cessation needs of cancer patients, and implement the program. This should include how the program will address potential patient/center barriers to implementation, what types of services (e.g., quitline, text messaging, direct counseling, medication) may be offered, how these services may fit into existing patient workflows, use of external resources (where relevant), and how follow-up with patients will be conducted.
- Outline a work plan that details a brief timeline for development and implementation (not to exceed the budget period), staff involved, staff training and hiring plans, workflow and IT integration, and specific program aims and objectives.
- Describe how the program will work with its IT/EHR team to implement any necessary changes to the EHR data collection workflow and reports to produce required Initiative data on reach and effectiveness.
- Outline preliminary plans for sustaining the program beyond the funding period. The sustainability plan must include proposed methods to address barriers to implementation, such as complexity of cancer care, licensing or proprietary tools, patient barriers (e.g., fatalistic beliefs about tobacco cessation), cancer center staff time, ongoing costs, and insurance challenges. An informal analysis of implementation and maintenance costs must also be included in the sustainability plan.
- Provide an evaluation plan for the program.
- Include funding to attend the twice-annual grantee meetings to share evaluation data and discuss lessons learned from program implementation.
- Describe the qualifications of the individual(s) who will conduct the work. Briefly elaborate on each person’s CV in the narrative response.

NCI Evaluation of Supplement Requests
Administrative supplements do not receive peer review. Instead, NCI staff with expertise in cancer prevention and control will evaluate supplement requests to determine overall merit. Proposals will be reviewed for quality and for responsiveness to application criteria outlined in the requirements for the five-page summary described above.

Reporting Requirements
As part of the progress report for the parent cancer center grant, information must be included on what has been accomplished via the administrative supplement (program details such as conceptual framework; tactics implemented; workflow incorporation; sustainability actions; progress on timeline tasks; and results from standardized evaluation measures on screening, reach, uptake, and other noted
measures). In addition, grantees will provide to the coordinating center data and other information regarding program reach and effectiveness every 6 months. Project leaders should plan to attend twice-annual meetings, where they will be expected to present their progress and findings to other awardees of these supplements.

**Pre-Submission Informational Webinar:**
An informational webinar will be held as noted below:

Time: Wednesday, March 18, 2020, 12:00 PM Eastern Time (US and Canada)

The registration link is as follows:
https://cbiit.webex.com/cbiit/onstage/g.php?MTID=efd5d082d707e740d9e21c3b1a67209c1

Dial-in information:

Call-in toll number (US/Canada)
1-650-479-3207

Meeting Number/Access Code: 739 299 805
Event password: J2d5pEBZw$6

**Questions**
For technical inquires (including eligibility), please contact your cancer center support grant administrator or your NCI program director. For inquiries about the scientific objectives and goals, please contact Stephanie Land at stephanie.land@nih.gov.