

Tobacco Quitline eReferral Integration into Cancer Centers

Planning and Implementation Guidance for Centers Interested in This Option

Introduction

The EHR has demonstrated its potential to enhance the treatment of chronic diseases such as obesity, diabetes, and congestive heart failure.¹ Research shows that EHR modifications can enhance adherence to clinical practice guideline recommendations,²⁻⁵ improve quality of care,^{6,7} and yield cost savings.⁸

Relevant to the Cancer Center Cessation Initiative (C3I), EHR modifications can increase the assessment and treatment of tobacco use with minimal interruption of the workflow of busy clinicians.⁹⁻¹¹ The EHR also has the potential to reduce the costs and burden of delivering tobacco dependence interventions by efficiently referring smokers to available external treatment resources such as state tobacco quitlines.¹²⁻¹⁴ Importantly, the tobacco quitline referrals and other such “treatment extenders”, are designed to support the tobacco dependence treatment provided in the clinic and is not a substitute for clinically delivered tobacco dependence treatment interventions.

Tobacco quitlines (800-QUIT-NOW) are free evidence-based tobacco cessation treatment services that provide counseling (and sometimes medication) to tobacco users¹⁵ and are available in all 50 states (<http://map.naquitline.org>). With the expanding use of both EHRs and quitlines nationally, demand has increased to create a fully electronic, closed-loop, Health Insurance Portability and Accountability Act (HIPAA)-compliant tobacco quitline referral mechanism (“eReferral”) that can be incorporated into the EHR. Quitline use is effective in boosting rates of smoking cessation, but it is underutilized, with only about 1 % of smokers in the United States using quitlines each year¹⁶⁻¹⁹ and only 17 % of these reporting that a health care provider referred them to this tobacco cessation treatment.¹⁶ eReferral is a promising tool to increase quitline utilization.

The purpose of this guide is to provide a basic “how-to” for implementing tobacco quitline EHR-based referrals (eReferrals). The core IT components of the tobacco quitline eReferral are an **alert**, a **referral order**, a **referral order result**, and **interfaces**. This same EHR functionality and workflow can also be used to refer patients who smoke and are interested in quitting to an internal resource such as a tobacco cessation specialist.

The successful implementation of a clinic-based tobacco quitline eReferral requires the following steps:

1. Secure health care system leadership buy-in and support (clinical, administrative, information technology);
2. Identify and implement clinic workflow adjustments to support the healthcare team in delivering the tobacco dependence treatment intervention. With clinician input, define which clinicians are responsible for delivering the tobacco quitline intervention and placing referral order.
3. Enlist Information Technology (IT) staff in your system to build the following components:
 - a. An EHR **alert** for current smokers based on current tobacco use status (Figure 1).
 - b. A **referral order** and **referral order result** (to and from the tobacco quitline and/or an internal tobacco cessation specialist) (Figure 2 and Figure 3).
 - c. **Interfaces** for secure transmission of patient data to the tobacco quitline (and/or tobacco cessation specialist) and treatment service data from the tobacco quitline (and/or tobacco cessation specialist) back to the patient’s EHR. Your system IT staff are familiar with interfaces and frequently build them.

4. Train (in-person or electronically) all clinicians and staff about the intervention, workflow, and tobacco cessation services available via eReferral, with an emphasis on who does what (workflow). Also, provide online or other access to training materials for new staff and those who did not attend the initial training.
5. Establish an eReferral “go-live” date – the date that the eReferral functionality is available for clinicians. After go-live, monitor implementation and have a protocol for troubleshooting and quality assurance (IT staff person may be needed for this).

Figure 1. EHR Current Smoker Alert Example²⁰

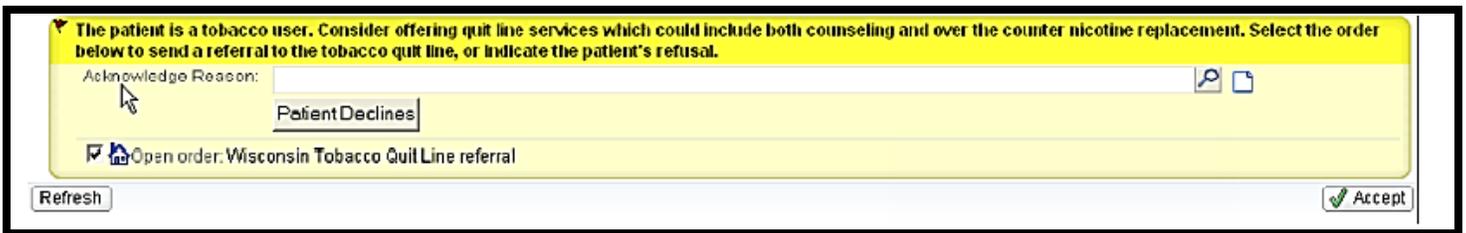


Figure 2. Tobacco Quitline Referral Order Example²⁰

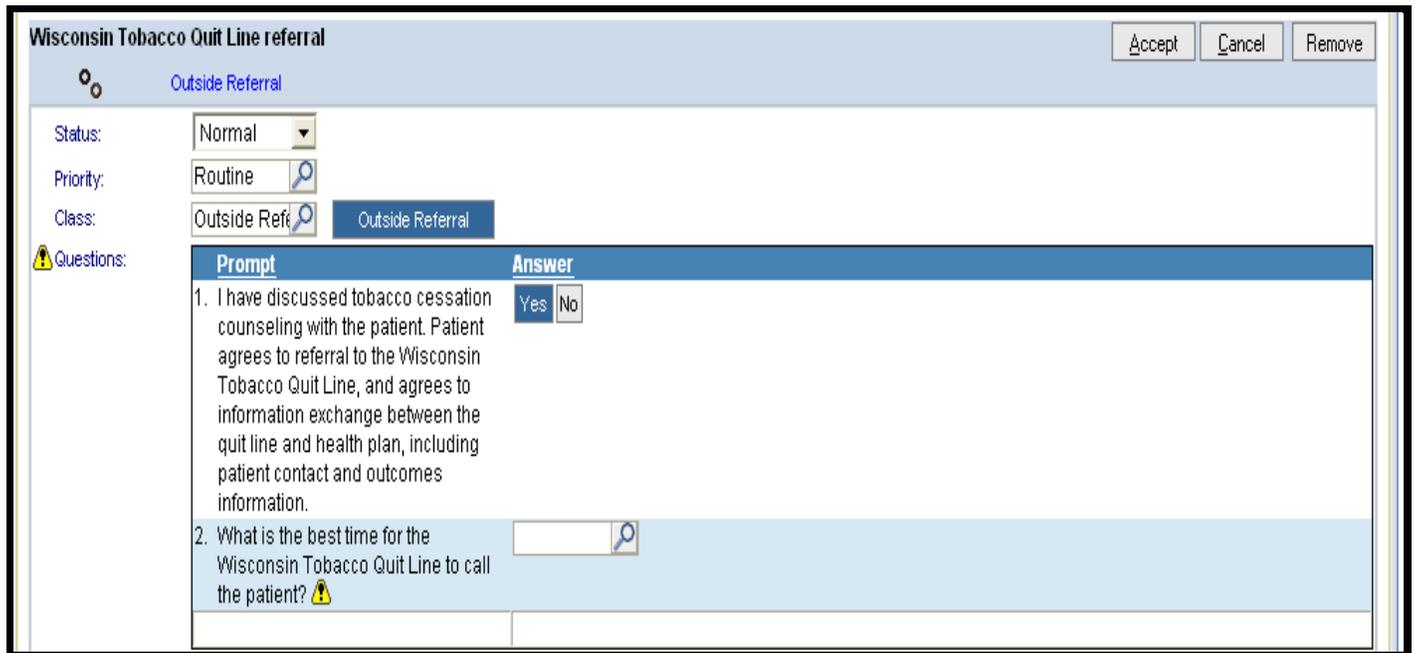


Figure 3. Tobacco Quitline Referral Order Result Example²⁰

Results		REF TO WISCONSIN TOBACCO QUIT LINE	
Patient Information			
Zztest, Bullwinkel M [40720611]	DOB	06/23/1956	Female
8889 se	Home Phone		
MINERAL POINT, WI 53565	Work Phone	608-256-3333	
Contact Information			
Date	Provider	Department	Encounter #
3/20/2012	Meetul V. Shah, MD	Dc Fish Hatch Fm	65711142
Result Information			
Status	Provider Status		
Final result (3/23/2012 12:30 PM)	Ordered		
Entry Date			
3/23/2012			
Result Narrative			
Free and Clear contact date: March 21, 2012			
Free and Clear call disposition: One-Call			
Free and Clear status: Accepted Services			
Treatment plan:			
Planned quit date: March 30, 2012			
Nicotine Gum 4 mg - 4 weeks			
Lab and Collection			
REF TO WISCONSIN TOBACCO QUIT LINE (Order #77067265) on 3/20/2012 - Lab and Collection Information			
Order Providers			
Authorizing Provider	Encounter Provider		
Shah, Meetul V., MD	Shah, Meetul V., MD		

Order		NICOTINE 21 MG/24HR TD PT24 [32349] (Order 77068137)		
Provider Information				
Ordering User	Authorizing Provider			
Interface, Aleredispende	Services, Tobacco Cessation			
Medication Detail				
NICOTINE 21 MG/24HR TD PT24	Quantity	Refills	Start	End
Sig : Apply 1 patch once daily.	1	0	4/5/2012	4/18/2012
Route : (none)				

Tobacco Quitline eReferral Workflow Example (Figure 4)

The following is an example of the tobacco quitline eReferral clinical workflow that has been successfully implemented with health systems in Wisconsin. Of course, each health care system may vary the roles of clinicians and workflow.

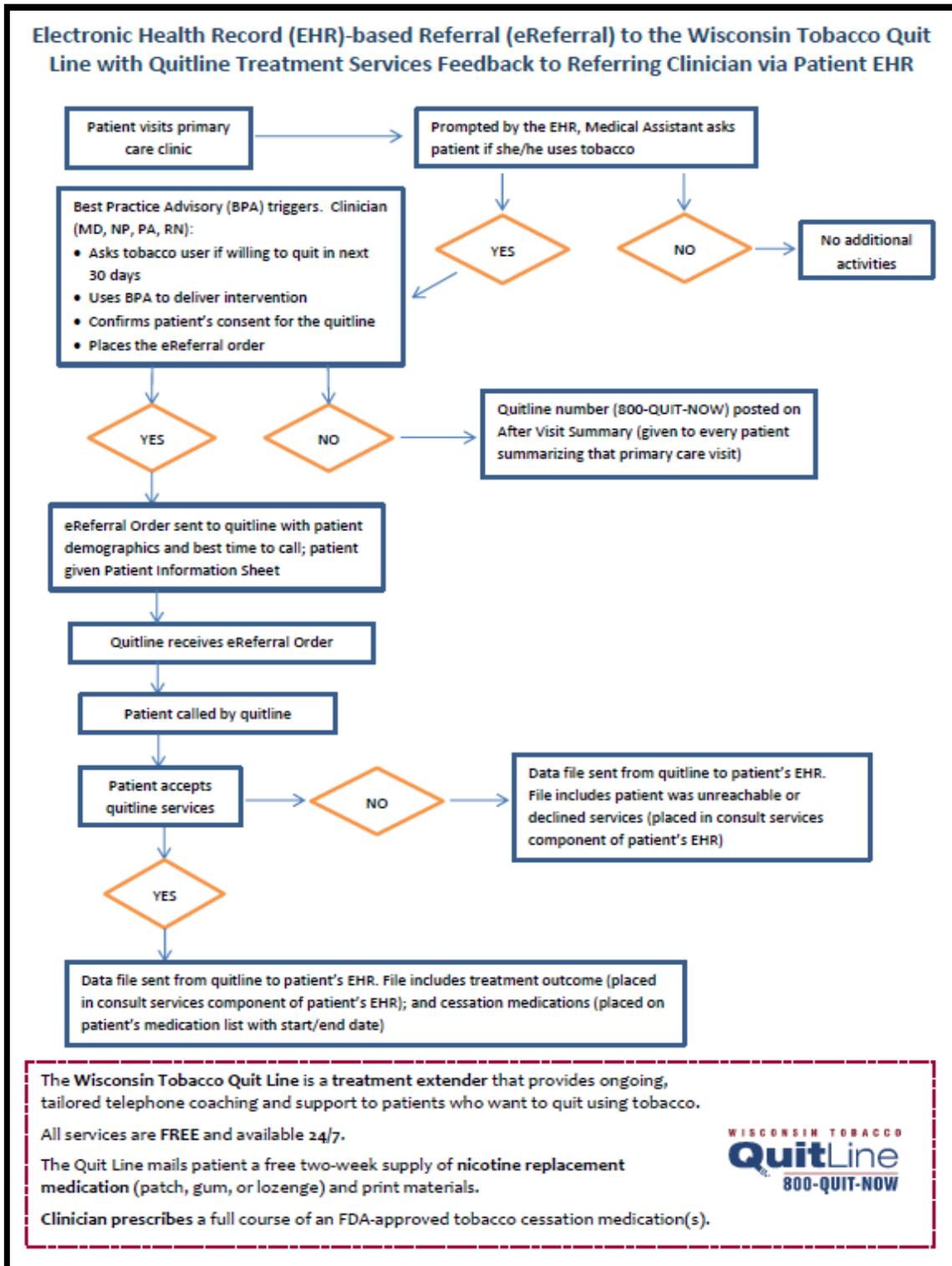
With the eReferral system, during a patient visit, the EHR prompts the clinic medical assistant (MA) or roomer to inquire about tobacco use as part of the standard EHR workflow for virtually all health systems required by the Meaningful Use EHR Incentive Program. The MA’s documentation of tobacco use activates an EHR **alert** that electronically prompts the clinician or Medical Assistant to offer evidence-based tobacco quitline services. The alert presents the clinician the choice of selecting a tobacco quitline eReferral order or documenting that the patient “declined” a referral. If the patient is interested in making a quit attempt within the next 30 days and indicates an interest in the tobacco quitline services, the clinician accepts the alert, which then presents him/her with the tobacco quitline **eReferral order**. The order automatically populates the patient’s name and contact information, and presents time range options for the clinician to indicate the patient’s preferred time to be contacted by the quitline. Once completed, the eReferral order is placed, sending it to the tobacco quitline vendor.

Standardized, defined, discrete data fields are used and exchanged to facilitate extraction and reporting of data for meaningful use and quality measure achievement reporting. The exchange of information in both directions between the health system and the tobacco quitline vendor is done via **interfaces**, which are secure, HIPAA-compliant and use HL7, a set of international standards for the transfer and sharing of clinical and administrative data.

After the tobacco quitline receives an eReferral, they attempt to contact the patient and to provide tobacco cessation counseling services, with some states also providing tobacco cessation medication as appropriate. After the tobacco quitline completes treatment or exhausts the attempts to contact and engage the patient, the quitline electronically sends the eReferral contact and treatment data back to the patient’s EHR as a **referral order result**. This information automatically populates the patient’s EHR in two places—data on patient contact, counseling provided, and quit date

are saved as a referral order result, while provision of nicotine replacement medication (including the medication start and end dates based on the quit date) is documented in the patient's medication list. If the second, separate medication interface is not built, information regarding the medication sent to the patient by the quitline will appear in the referral order result, but will not appear on the patient's medication list.

Figure 4. Tobacco Quitline eReferral Clinical Workflow Example



Planning and Implementation Guide – Specific Steps

1. Secure Health care system leadership buy-in and support

The crucial first step is to secure *buy-in and support* from health care system leadership (administration, information technology (IT), clinical). Leadership has to agree and endorse that: the tobacco quitline eReferral is a system, clinical and IT priority; that the tobacco quitline eReferral build and testing is a priority in the IT staff work queue; and, that system resources will be designated for this work. This is also a good time to identify and enlist clinician or staff *champions*.

2. Define the workflow (with clinician input) as this will determine some aspects of the IT build

The following steps will need to be defined:

- a. For whom will the current smoker EHR alert fire (the Medical Assistant/Roomer who documents smoking status or the Clinician/Provider who will deliver the intervention and sign the referral order)?
- b. Who can and will prescribe the tobacco cessation medication for those interested in making a quit attempt? Note that most state quitlines only provide a starter course of nicotine replacement therapy. The patient may need a prescription for a full course of NRT or you may determine that the patient will use varenicline or bupropion.
- c. Who can and will sign and place the tobacco quitline eReferral order?

3. Build the Information Technology (IT) functionality and interfaces

- a. Prior to beginning the state tobacco quitline eReferral IT build:
 - i. Work with your IT contact to identify the IT areas/expertise that will need to be involved in the state tobacco quitline eReferral build – interfaces, alerts, orders, etc.
- b. Identify the *tobacco quitline* that serves your state (<http://map.naquitline.org>). This resource also includes a tobacco quitline contact person for provider referrals in most states.
- c. Health care system IT staff build the tobacco quitline eReferral mechanism and interface. Here are some tips to guide the IT build:
 - i. The quitline eReferral is built using an *alert* and a *referral order*.
 - ii. The tobacco quitline services outcome data is returned from the tobacco quitline as an *order result*.
 - iii. The closed-loop feedback about the quitline service results that come back to the health system as a *referral order result* will include patient contact details, patient quit date, counseling provided, and information about any medication that the quitline sent to the patient.
 - iv. If the tobacco quitline sent the patient medication, that information will populate the patient's *medication list* with a start and end date.
 - v. Ideally, health care systems will build, if necessary, a second, separate interface for transmitting the quitline medication disbursement information back to the health system to populate the patient's medication list with a start and end date. If building a separate medication interface is not feasible, the quitline referral order result described in B iii will include information about any medication sent to the patient by the quitline. Importantly, if a single interface is used, the medication information will not populate the patient's medication list with a start and end date.
 - vi. The referral order and result is transmitted to and from the quitline using HL7, real-time, web-based *interfaces*, built by the system IT staff. To assist the IT build, your system's EHR

vendor may have a build guide with the technical specifications. For example, Epic Systems, Inc. has a tobacco quitline eReferral build guide on their password-protected “User Web” customer site (<https://userweb.epic.com/> - search “Smoking Cessation Intervention Using a Tobacco Quitline”).

- vii. Similarly, the major tobacco quitline vendors in the United States may be able to provide technical specifications to assist the health care system IT staff with the build and interfaces. For example, Optum (largest U.S. tobacco quitline vendor) has eReferral *technical specification* documents.
 - viii. The build process is also an ideal time to ensure that the tobacco use identification, treatment intervention, and documentation is in discrete, reportable fields.
- d. After the tobacco quitline eReferral and interfaces are built by the health care system and system internal quality assurance is completed, *testing* can begin. Testing of the functionality and interfaces is conducted by the health care system IT staff referring “test” patients to the state quitline. Quitline technical staff will process the test patient orders and send the quitline services test data from the quitline to the health system’s EHR. This is typically done in an IT test environment before the “go-live” when real patients will be referred. One recommendation is to schedule time with your system IT staff and the tobacco quitline vendor staff to conduct such live testing. This allows real-time troubleshooting and alterations. It is helpful to have a project lead or champion facilitate communication and schedules between health system IT and tobacco quitline vendor staff.

4. Train all clinicians and staff

During the build process, a *go-live* date (the date that the eReferral functionality is available) needs to be identified. A day or two prior to the go-live date, it is strongly recommended to *train* all of the clinicians and staff who will be using the tobacco quitline eReferral. It is important that clinicians and staff *understand the services that the tobacco quitline can provide* their patients, that *only patients who are ready to quit should be referred* to the quitline, and that the *tobacco quitline serves as an extension, and not a replacement, of the treatment being provided in the clinic*. It is important **to demonstrate the EHR screens, prompts, and clinical decision support to the clinicians and staff so that everyone in the clinic/department understands the quitline eReferral workflow**.

For example:

- Who identifies and documents patients who use tobacco?
- How is the clinician alerted to a patient’s tobacco use?
- How is the tobacco dependence treatment brief intervention presented in the EHR?
- Is it triggered as a practice alert for every patient who is identified as a current tobacco user?
- Who delivers and documents the brief tobacco dependence treatment intervention?
- Who discusses and orders the appropriate tobacco cessation medications for patients who want to make a quit attempt, including for those patients who are referred to the tobacco quitline?
- Who places the referral order? Is it pended by rooming staff/Medial Assistants for clinicians (doctors, nurses, physician assistants) to review and place?
- What is the protocol and workflow for patients who use tobacco and do not want to quit at this time? Figure 3 shows a *suggested workflow* for you to tailor to your site.

5. Strategize for “Go live”

- a. It is recommended to *pilot* the tobacco quitline eReferral in one small clinic/department before launching system-wide. This will afford the opportunity to refine and calibrate the EHR tools, functionality, and workflow prior to full deployment.
- b. Within a couple weeks of the go-live, communicate with clinicians and staff who are using the tobacco quitline eReferral to identify any technical or workflow issues or concerns. Identify and communicate with the person/people/department who can solve any issues that are raised. The degree to which such issues and concerns are addressed will meaningfully influence the willingness of the clinicians and staff to use this functionality.

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