

Short Report

Integration of alcohol use disorders identification and management in the tuberculosis programme in Tomsk Oblast, Russia

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Alcohol use disorders (AUDs) among tuberculosis (TB) patients are associated with nonadherence and poor treatment outcomes. We developed a multidisciplinary model to manage AUDs among TB patients in Tomsk, Russia. First, we assessed current standards of care through stakeholder meetings and ethnographic work. The Alcohol Use Disorders Identification Test (AUDIT) was incorporated into routine assessment of all patients starting TB treatment. We established treatment algorithms based on AUDIT scores. We then hired specialists and addressed licensing requirements to provide on-site addictions care. Our experience offers a successful model in the management of co-occurring AUDs among patients with chronic medical problems.

Keywords: alcohol use disorders, tuberculosis, Alcohol Use Disorders Identification Test, Russia, systems integration, Siberia

Introduction

The Russian Federation ranks 12th on the World Health Organization's (WHO) list of high tuberculosis (TB)-burden countries.¹ Many TB patients in Russia are marginalized by homelessness, unemployment and incarceration.^{2,3} These socioeconomic factors are also associated with an increased risk of alcohol use disorders (AUDs), defined as alcohol abuse or dependence per the *Diagnostic and Statistical Manual of Mental Disorders, fourth edition (DSM-IV)* or *International Statistical Classification of Diseases and Related Health Problems, Tenth Revision (ICD-10)*.^{4,5} Based on DSM-IV, Fleming *et al.*⁶ identified AUDs in 55% and 70% of TB patients in St Petersburg and Ivanovo, respectively. AUDs are associated

with worse treatment outcomes in numerous Russian cohorts.^{2,7}

The Tomsk Oblast Tuberculosis Services (TOTBS) prioritized addressing AUDs among TB patients when the Global Fund to fight AIDS, Tuberculosis and Malaria (GFATM) awarded funds in 2004. The TOTBS worked with Partners In Health (PIH), the principal recipient of the GFATM grant, to integrate alcohol management in TB care. Here, we describe these activities, including key successes and challenges.

Setting

Tomsk Oblast (area 316 900 km²; half of the total population 1 040 000 lives in Tomsk City) is located in western Siberia. The three primary TB treatment sites in Tomsk City (TB Oblast hospital, day hospital and polyclinic) registered a total of 1066, 1132 and 1036 patients, respectively, in 2004, 2005 and 2006. Patients are referred to the inpatient or day hospital to initiate treatment, with subsequent transfer to the polyclinic or a rural district hospital. Tomsk implemented the WHO-endorsed DOTS strategy in 2001.⁸ Drug susceptibility testing is performed on all culture-positive patients. Standardized short course chemotherapy is provided to new patients, with regimen changes based on resistance data. TB physicians work with a multidisciplinary team of nurses, surgeons, radiologists, social workers, psychologists, psychiatrists and addiction specialists (narcologists).

AUD management is not integrated into Russian TB services. Narcologists are responsible for diagnosing and managing AUDs; patients are self-referred or referred by other physicians. Ambulatory care for AUDs is provided at a central Tomsk Narcology Dispensary. AUDs may be managed by narcologists in hospitals and primary care settings, provided the establishment has an institutional 'license'. The Tomsk Oblast TB hospital has a full-time narcologist on-site. Standard of care includes detoxification, pharmacological interventions (e.g. disulfiram) and psychotherapy/counselling.

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Methods

This is a descriptive study of programmatic efforts to integrate alcohol care into TB services from 2004 through 2006. We used qualitative and quantitative methods. We performed ethnographic interviews that were transcribed and translated, as well as multiple structured observation sessions with detailed field notes; all were coded for theme and content. We also collected data from the TOTBS registry (baseline sociodemographic and clinical characteristics, AUDIT score), as well as TB hospital and PIH records (addictions and psychology consultations performed) on consecutively enrolled patients from 2004 through 2006. This cohort includes both new and previously treated individuals (smear-negative and smear-positive) treated in the three Tomsk City facilities. We described the proportion of individuals undergoing AUDIT and successfully referred to addictions care.

Results

From 2004 to 2005, local Tomsk providers and international collaborators conducted a series of meetings to review evidence-based alcohol interventions and plan an implementation strategy. We also conducted a rapid ethnographic study and identified the following:

- (i) Few TB patients were diagnosed with AUDs due to lack of resources and training in alcohol screening available to TB physicians.
- (ii) Even fewer patients with AUDs were successfully referred to addictions services due to the pre-contemplative states of many patients, stigma and barriers to accessing narcology care.
- (iii) On-site addictions services were limited because of difficulties recruiting narcologists and psychologists.
- (iv) Strengths of TB services included close follow-up of TB patients; daily contact with patients through directly observed therapy; strong commitment among TB physicians and administrators to improve alcohol care; and availability of finances through the GFATM.

A 10-question internationally validated screening instrument—the Alcohol Use Disorders Identification Test (AUDIT)—was created by the WHO in 1989 to assess recent alcohol use across three domains: consumption, consequences and dependence symptoms.⁹ We obtained and translated the AUDIT manual and developed a Standard Drinks Card for the Russian population (Available from: www.pih.org/inforesources/img/Standard_Drinks_Card_color.pdf). This card helps patients and physicians to determine the volume of daily alcohol consumption, including home brews (*samogon*) and ethanol substitutes (*surrogatii*). After initial piloting, 34 TB physicians were trained to use the AUDIT and Standard Drinks Card. The TOTBS issued a programmatic policy (*prikaz*) mandating the use of the AUDIT as a routine part of initial intake for all TB patients starting November 2005.

We established a management algorithm wherein patients with AUDIT ≥ 8 are referred to a psychologist and/or narcologist for evaluation and management since TB physicians lack training and time to deliver addictions care. Inpatient group therapy and Alcoholics Anonymous meetings were also offered. Patients also receive social worker assistance and home visits to treatment defaulters with AUDs. We also hired additional personnel (one narcologist, one psychologist). The Chief of the Tomsk Oblast Health Department ensured collaboration of Tomsk Narcology Services and TOTBS to complete licensing and administrative requisites to provide addictions services in ambulatory TB sites.

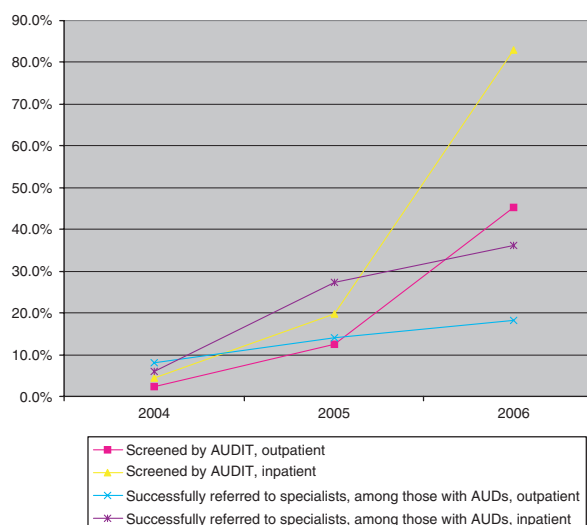


Figure 1 Trends in AUDIT screening and successful referral of individuals with AUDs (AUDIT ≥ 8 and/or diagnosis of AUD per TB registry) to addictions specialists and/or psychologist, by treatment site

Of a total of 851 screened by AUDIT through 2006, 55.1% had an AUDIT score ≥ 8 . Figure 1 demonstrates the increase in screening and successful referral. In 2006 (post-implementation), 61.4% of individuals starting treatment were screened by the AUDIT and 28.5% of all individuals with AUDs were successfully referred. Implementation was more comprehensive in the TB hospital, given fewer obstacles such as travel distance, coordination with narcology services and patient receptiveness; nonetheless, even in ambulatory sites, screening and successful referral has increased over time.

Discussion

We successfully introduced the AUDIT and the Standard Drinks Card, established referral algorithms, and hired additional staff to integrate AUDs management in TB services. Challenges included recruiting specialists given their fear of contracting TB. Although most TB patients were willing to complete the AUDIT, many were reluctant to receive addictions treatment, but referral improved when TB physicians explained the effect of alcohol consumption on TB outcomes and framed alcohol management as an integral component of TB treatment. Integrated care has been more challenging in ambulatory, compared with inpatient, sites. Future efforts include operational research to evaluate the impact of alcohol treatment efforts. We have also initiated a programme to provide home-based directly observed therapy for non-adherent patients and a clinical trial to evaluate the effectiveness of naltrexone and/or brief counselling interventions delivered by TB physicians.¹⁰

The Tomsk TB programme has implemented innovative steps to integrate alcohol management into TB care. Our experience offers a successful model for addressing AUDs in patients with co-occurring chronic medical problems.

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Conflicts of interest: None declared.

Key points

- AUDs are associated with non-adherence and poor TB treatment outcomes, presenting a major challenge to effective TB treatment in Tomsk, Russia.
- TB patients with AUDs have difficulties obtaining addictions specialist care.
- Initial assessment showed that TB physicians in Tomsk lacked resources and training in AUD screening and management.
- We introduced a simple screening tool—AUDIT—to screen for AUDs among TB patients, and established referral algorithms based on AUDIT scores. Alcohol management was integrated into TB care to increase patient uptake.
- An integrated interdisciplinary model builds upon the strengths of the existing TB system and supports management of AUDs in patients with co-occurring chronic medical problems.

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