



## **Capacity building for smoking cessation training in Latin America (LA): expanding the work of Global Bridges**

### **AHRQ Grant Final Progress Report**

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## 1. Structured Abstract (Select for Elements)

Structured Abstracts (250 words)



**Purpose:** During 2014-16 to develop a smoking cessation Train-the-Trainers curriculum adapted to Latin America and consistent with the WHO's Building Capacity for Tobacco Control training packages; provide face-to-face Train the Trainer courses and develop a Global Bridges Latin America (GBLA) smoking cessation Trainer's team with partner organizations; and provide Smoking Cessation Training (SCT) sessions partnering with healthcare organizations.

**Scope:** To maximize the impact and sustainability of training, project was focused on building capacity in LA healthcare organizations and to promote smoking cessation training through a Train-the-Trainers approach to strengthen health systems for treating

tobacco dependence. Target countries were Argentina, Bolivia, Mexico and Uruguay.

**Methods:** Building capacity had two elements: (1) signing agreements with healthcare institutions to engage and commit them to sustainable support for tobacco dependency treatment, and (2) training a cadre of Trainers to help improve healthcare workers' knowledge, skills and confidence to routinely identify tobacco use and provide brief advice to assist cessation, in accordance with WHO FCTC Article 14 guidelines, and the WHO training package.

**Results:** Contracts were signed delineating responsibilities of healthcare institution and GBLA-IAHF. Train the Trainer sessions plus feedback and follow-up yielded 71 trainers that met competency criteria to provide training in tobacco dependence treatment in primary care. Tobacco Cessation Training resulted in 585 health agents trained to provide brief advice. Each institution in turn conducted 2.1 training sessions on average. The Entre Ríos project on healthcare professionals' application of teaching to their practices was completed and is currently being written for publication.

**Key Words:** smoking cessation training, Latin America, train the trainer

## 2. Purpose (Objectives of Study)

1. Develop a smoking cessation Train-the-Trainers curriculum adapted to the Latin American region and consistent with the WHO's Building Capacity for Tobacco Control training packages,
2. Provide face-to-face Train the Trainer courses and develop a Global Bridges Latin America (GBLA) smoking cessation Trainer's team with partner organizations, and
3. Provide Smoking Cessation Training (SCT) sessions in partnership with healthcare organizations.

## 3. Scope (Background, Context, Settings, Participants, Incidence, Prevalence)

Global Bridges (GB) & the InterAmerican Heart Foundation (IAHF) had successfully trained over 1,358 healthcare providers on the importance of smoking cessation, the tools to aid smoking cessation, and techniques in applying smoking cessation skills during the period 2010-13. Although initial goals were met, and even tripled for Latin America, the impact of smoking cessation training on public health outcomes was limited.

To maximize the impact and sustainability of the training, the project in 2014-2016 was refocused to build capacity in Latin American healthcare organizations and to promote smoking cessation training by focusing on a Train-the-Trainers approach, the principal objective being to strengthen health systems for treating tobacco dependence through improving healthcare workers' (HCW) knowledge, skills and confidence to routinely identify tobacco use and provide brief advice to assist cessation, in accordance with Article 14 of the WHO FCTC guidelines using the WHO training package "Strengthening health systems for treating tobacco dependence in primary care."

The team included a central team with Drs. Gustavo Zabert and Beatriz Champagne as co-PIs, Master Esteban Cruz from Mexico's National Institute of Public Health to provide adult and medical education expertise, Ms. Victoria Baldi and Mr. Javier Valenzuela to support administration, translation, networking, follow-up, logistics. In each country we had focal points that work with local institutions to identify those interested and willing to become partners.





The setting for training were the institutions that made a commitment to identify trainer candidates, provide them the resources needed to become fully competent trainers, provide time for practice and training of healthcare professionals and allow for them to continue to train others in their institution. Occasionally training occurred at conferences or other professional meetings.

Participants were healthcare professionals from a variety of specialties including pneumologists, cardiologists, family and general practitioners, nurses, psychologists and social workers.

#### 4. Methods (Study Design, Data Sources/Collection, Interventions, Measures, Limitations)

Strategy:

1. The intervention strategy was to approach organizations to partner with the GB & IAHF to build capacity for smoking cessation training within their organizations. Organization and country selection was based on previous partnership and interaction with GB & IAHF as well as motivation and feasibility to achieve goals.
2. We offered a two day training session: **Day 1** -Train the Trainer module and **Day 2** -Smoking Cessation program. Day 2 was based on Part III and IV of the WHO training package “Strengthening health systems for treating tobacco dependence in primary care.” Train the Trainer module was led by the team expert in medical education.
3. Partner organizations were requested to sign a letter of agreement with IAHF for the project, to select and propose smoking cessation experts to attend TRAIN THE TRAINER module, and schedule at least 2 SC sessions in the following year.
4. To estimate impact we conducted a survey of a sample of healthcare professionals that participated in this program in 2016.

Materials:

1. WHO training package “Strengthening health systems for treating tobacco dependence in primary care” (PAHO’s translation to Spanish)
  - a. Part III: Training for primary care providers: brief tobacco interventions;
  - b. Part IV: Training for future trainers: applying adult education skills to training.
2. Global Bridges evaluation form.
3. Contract between healthcare institutions and IAHF.

Principal outcomes measures:

1. Train the Trainer: competent trainers to provide training for treating tobacco dependence in primary care setting.
2. Smoking Cessation training: competent healthcare providers that routinely deliver brief interventions to help tobacco users quit and protect from exposure to second hand smoke.
3. Training sessions provided by partner organizations

Key selection criteria (KSC) for HCP that apply for TRAIN THE TRAINER

- background knowledge
- smoking cessation experience
- communication skills
- teaching abilities
- emotional stability



Accreditation and certification criteria for Trainers:

1. **Attendees:** attendees that satisfy Knowledge Skills and Confidence, but do not satisfy components of Competence or Performance. This category may act as facilitator in case study presentations or role playing but are not accredited as assistant trainer or trainer,
2. **Assistant Trainer:** do not satisfy one component (competence or performance). Persons that reach this level may act as facilitator in case study presentation or role playing or lecture but do are not accredited as trainer,
3. **Trainer:** someone that fulfills competence and performance requirements. At this level the person may present lectures and may chair a Smoking Cessation Training session and be included in the Trainer team.

The medical education expert provided follow up and feedback to the Trainers team (Esteban Cruz) in a number of ways:

1. Facebook (Programa Entrenadores GBLA FIC)
2. Toolbook for Train the Trainer, background materials, peer evaluation, and tutoring support
3. Online Train the Trainer updates (under development in Blackboard platform)
4. Qualitative evaluation

Poster below offers additional detail on this project strategies and methods:

**“Capacity building for smoking cessation training in Latin America: expanding the work of Global Bridges 2011-2013”**  
InterAmerican Heart Foundation, Latin America Region  
Gustavo Zaberit, Beatriz Champagne, Esteban Cruz

**Background and Project Overview**

Global Bridges & the InterAmerican Heart Foundation (IAHF) have successfully trained over 1,328 healthcare providers on the importance of smoking cessation, the tools to aid smoking cessation, and techniques in applying smoking cessation skills. Although initial goals were met, and even exceeded in Latin America, the impact of smoking cessation training on public health outcomes is limited. To maximize the impact of this training, the project was refocused to build capacity in Latin American healthcare organizations and to promote smoking cessation training by focusing on a Train the Trainers approach, the principal objective being to strengthen health care teams for treating tobacco dependence through improving their knowledge, skills and confidence to routinely identify tobacco use and provide brief advice to assist cessation, in accordance with Article 14 of the WHO/CDC guidelines using the WHO training package.

**Project Objectives:**

1. Develop a smoking cessation Train the Trainers (TTT) curriculum adapted to the LA region and consistent with the WHO’s Building Capacity for Tobacco Control
2. Provide face-to-face TTT courses and develop a GBLA smoking cessation Trainers’ team in partner organizations.
3. Provide smoking cessation training (SCT) sessions in partnership with healthcare organizations.

**IAHF**  
InterAmerican Heart Foundation is the official representative of the Americas to the World Heart Federation. IAHF’s mission is to reduce heart disease and stroke, and related non-communicable diseases, in Latin America and the Caribbean and promote health through research, advocacy, public awareness and education. Tobacco control has been one of IAHF’s main priorities since its creation in 1994.

**Key objectives are:**

- Promote advancement throughout the Americas that is conducive to the prevention of heart disease and stroke
- Promote the growth and development of foundations that will take active roles in public education, professional education, public advocacy, and fund raising.
- Foster partnerships between health professionals, business, industry, and other sectors of society for the accomplishment of its mission and goals.

**Global Bridges and IAHF**  
Global Bridges & the IAHF have reached more than 2,000 healthcare professionals from 70 healthcare organizations and successfully trained over 1,328 healthcare providers between 2011 to 2014 in Latin America and the Caribbean. In this project, organizations and countries were approached with the objective of building training capacity and to promote smoking cessation training in their affiliate.

**Outcomes**  
TTT: competent trainers to provide training for treating tobacco dependence in primary care setting.  
SCT: training competent healthcare providers that routinely deliver brief interventions to help tobacco users quit and protect themselves from second hand smoke. Training sessions provided by partner organizations.

**TRAIN THE TRAINERS (TTT)**  
ATTENDEES: 62 experts  
Countries: 12  
Trainers (Level 2): 12  
Trainers (Approved Level 2): 24

**SMOKING CESSATION TRAINING (SCT)**  
ATTENDEES: 180 health care providers  
Attendees to SCT include: 146 TTTs  
Attendees to SCT in action by partner: 90

**TRAINING SESSIONS**  
TTT: 4  
SCT: 6  
SCT by partners: 4

**Lessons Learned**  
Ability to deliver tobacco prevention and quit advice is essential to a successful cessation.  
Partner organizations need to include tobacco cessation in TTT trainings.  
SCT training competent healthcare providers that routinely deliver brief interventions to help tobacco users quit and protect themselves from second hand smoke.  
Trainers’ competence after TTT had been variable. Further a more approach in the training process was needed to address this challenge. In 2013, the IAHF revised the training package to include SCT. This revised package included a 2-day Train the Trainer module in addition to the existing 1-day Train the Trainer module. The revised package included a 2-day Train the Trainer module and a 2-day SCT module. The revised package included a 2-day Train the Trainer module and a 2-day SCT module. The revised package included a 2-day Train the Trainer module and a 2-day SCT module.

**Intervention design and methods**  
The intervention strategy was to approach organizations to partner with the GBLA/IAHF to build capacity for smoking cessation training within their organizations. Organization and country selection was based on previous partnership and interaction with GBLA and IAHF, as well as feasibility to achieve goals. GBLA/IAHF offered a 4-day training session (Day 1- Train the Trainer module and Day 2- Smoking Cessation program) based on Part II and IV of the WHO/CDC training package “Strengthening health systems for treating tobacco dependence in primary care”. TTT module was led by our team expert in medical education. Partner organizations were requested to sign a letter of agreement with IAHF for the project, to select and propose SCT experts to attend TTT modules, and schedule at least 2 SCT sessions in the following year.

**Miscellaneous outcomes, beginning Fall and past two (2012-2013-2014)**  
(Level 2e certified Level 2a & 2b)

**Next Steps**  
Develop a form of WHO/CDC’s training package Part II and IV propose to organizations attendees as a report of Mission Level 2 and Level 3. In our experience, all dimensions reports of positive outcomes in more than 90% for both modules. Objective evaluation of TTT for Level 4 Competence of TTT, strategy and Level 5 (performance on Day 2). Additional outcomes goal that is required agreement to ensure trainers’ expertise. Furthermore, for SCT there is no clear relationship between attendees’ self assessment and performance in clinical practice. GBLA/IAHF project is in the evaluation process for qualitative outcomes for TTT and institutional outcomes and commitment to change for SCT. In these dimensions (final selection, register in clinical flow and refer to SCT specialists).

## 5. Results (Principal Findings, Outcomes, Discussion, Conclusions, Significance, Implications)

### Major Outcomes:

1. Train the Trainer: 56 attendees Train the Trainer and trainers “competent” to provide training for treating tobacco dependence primary care setting.
2. Smoking Cessation training: 209 “competent” healthcare providers that routinely deliver brief interventions to help tobacco users quit and protect from exposure to second hand smoke.
3. 2.3 Training sessions provided per partner organizations

### TRAIN THE TRAINERS (Train the Trainer)

ATTENDEES: 62 Trainer Candidates

Certification:

Trainers (Level 3): 12

Trainer Assistant (Level 2): 31

### SMOKING CESSATION TRAINING (SCT)

ATTENDEES: 180 health care providers

Attendees to Smoking Cessation session after Train the Trainer: 91

Attendees to Smoking Cessation session by partners: 89

### TRAINING SESSIONS

Train the Trainer 4

Smoking Cessation Training 8

Smoking Cessation Training by partners 4

## SURVEY OF GBLA PARTICIPANTS 2016

In order to estimate impact of training on healthcare professionals’ practice we conducted a self-report survey to learn about their participants characteristics and how these professionals had incorporated what they learned into their healthcare practices. A limitation of this method is that is it self-report.

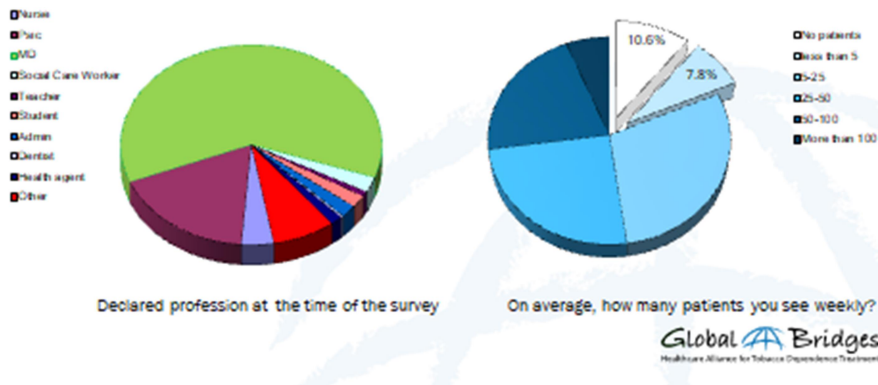
A randomized control trial was completed by our team in the Province of Entre Ríos, Argentina, to learn how professionals used what they learned in their primary care practice and the results are currently being written in a paper for publication. This work was conducted with a previous grant and included two researchers, Drs. Javier Saimovici and Carlos Boissonnet.

See graphics below showing results of the self-report survey 2016.



## LA Global Bridges trainees' survey 2016

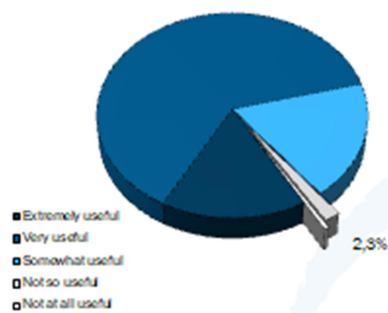
2016 Survey among all GB trainees (all that attended at least to one session)  
1.915 trainees with valid emails, sample size 400 in 3 "waves" for recruitment on weekly base but it was achieved in 2 (n=402). Response rate (2011-2014 17% and 2014-2016 56%) Web based (Survey monkey)  
26 questions: Demographics, Confidence in skills and SC practices



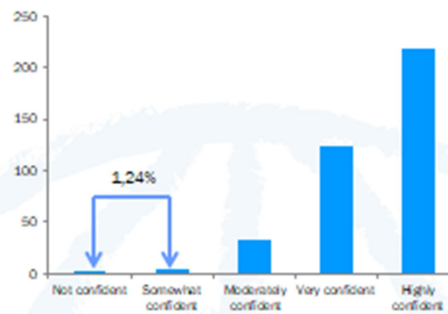
## LA Global Bridges trainees' survey 2016

n=402

How useful were Global Bridges' SC training?



How confident are you to provide BA in SC



Global Bridges  
Healthcare Alliance for Tobacco Dependence Treatment





Estimated number of smokers assisted per healthcare professional in the one year after training

	Smokers assisted per day	Smokers assisted per year	Cessation Brief advice (80%)	Quit Smoking with Brief Advice	Cessation Intensive Counseling (69%)	Quit Smoking with Intensive Counseling	Total Number that Quit Smoking Per HCW
Lower CI	1.6	600.6	480.5	12.0	323.2	38.8	50.8
Mean	2.1	788.3	630.6	15.8	424.2	50.9	66.7
Higher CI	2.6	975.9	780.7	19.5	525.3	63.0	82.5

CI: Confidence Interval; HCP: Healthcare professional

#### Assumptions

	Data	Source
Healthcare Professionals trained by Global Bridges	1,564	Data base
Brief Advice	80%	2016 Survey
Intensive counseling	69%	2016 Survey
Quit rate with Brief Advice	2.50%	Cochrane
Quit rate with Intensive Counseling	12.0%	Cochrane

#### What would be the population impact of Smoking Cessation training?

##### Survey worst scenario

- **80% of GB trainees said to offer 1.6 brief advice (BA) every working day for the year after training**  
 $1.564 \text{ trainees} \times 80\% \times 240 \text{ working days} \times 1.6 = 480,461 \text{ smokers assisted}$   
 $480,461 \text{ instances of Brief Advice} \times 2.5\% \text{ (abstinence rate)} = \mathbf{12,012 \text{ smokers quit with Brief Advice}}$
- **69% GB trainees said to offer NRT plus intensive intervention (IT) for the year after training**  
 $(600.6 - \text{those quitting via Brief Advice}) \times 69\% = 323.2 \text{ smokers IT+NRT}$   
 $323.2 \text{ smokers IT+NRT} \times 12\% \text{ (abstinence rate)} = \mathbf{38.788 \text{ smokers quit with IT+NRT}}$

**50,799 is the number of smokers that quit during the year after training**



### Partner organizations

Argentina: National University of the Comahue, Neuquén, Argentina

Bolivia: Servicio Departamental de Salud Santa Cruz (SEDES) and Instituto del Tórax, La Paz

Mexico: Instituto Nacional de Enfermedades Respiratorias (INER)

Uruguay: Fondo Nacional de Recursos (FNR), Montevideo, Uruguay

Costa Rica (consultation only): Caja Costarricense del Seguro Social (CCSS)

### Barriers:

1. Partner organizations required longer time periods for consideration and approvals than project had available.
2. Candidates to become Trainers by attending TRAIN THE TRAINER program were chosen by partner organizations and their competencies and knowledge of tobacco control were uneven making it more difficult to target the Training session properly

### Solutions

1. Partner organizations were requested to sign a letter of agreement with IAHF that provided clarity about the project expectations regarding timelines, criteria for trainer candidates, number of training programs partner had to carry out, and other aspects of the relationship.
2. We came up with a scheme to provide accreditation and certificates based on the level of skills displaced by participants.

### Conclusions

- World Health Organization training package Part III & IV was appropriate and feasible to use for Trainer candidates as well as healthcare professionals, with similar effectiveness.
- GBLA Training in Smoking Cessation curricula was effective in terms of Moore's model 3a, 3b and 4 levels.
- Train-the-Trainer participants required close comprehensive follow-up to achieve objectives and become qualified Trainers.
- Partnering with healthcare institutions, while adding time and complexity, provide institutional commitment and sustainability, beyond what the GBLA program was able to obtain in previous phases.
- Conservative scenarios modeling of smoking cessation intervention provided by trainees suggests a significant population impact.
- There is a need for long-term follow-up to evaluate model of training through existing healthcare institutions.

## 6. List of Publications and Products (Bibliography of Published Works and Electronic Resources from Study—Use AHRQ Citation Style for Reference Lists)

Zabert G, Champagne B, et al. “Entrenamiento en cesación tabáquica para agentes de la salud en América Latina: programa Global Bridges cambios conocimiento declarativo. Oral presentation and award. Asociación Argentina de Medicina Respiratoria (AMMR) Congress, October, 2017.

Zabert G. **Experiencia: Estimado el impacto del programa de capacitación de GB en Latinoamérica.** Oral presentation. Fifth Latin American and Caribbean Conference Tobacco or Health, Montevideo, Uruguay, June 13-16 2017.

Champagne B. **Workshop on helping your patients to a tobacco free future: Medical approaches to CV patients.** World Congress of Cardiology 2016, Mexico City, June 4, 2016.

