

# **ASSESSMENT OF MULTIPLE LAYERS OF SECURITY SCREENING OF TRUCKS BY CUSTOMS BORDER PROTECTION IN EL PASO, TEXAS**

*by*

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*Project performed by*

Center for International Intelligent Transportation Research

*In cooperation with*

Coalición Empresarial Pro Libre Comercio (CELC)

Report No. 186043-00005

CIITR Project 186043-00005:

August 2013

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## **DISCLAIMER AND ACKNOWLEDGMENTS**

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This research was performed by the Center for International Intelligent Transportation Research, a part of the Texas A&M Transportation Institute, in cooperation with the Coalición Empresarial Pro Libre Comercio (CELC). The contents of this report reflect the views of the authors, who are responsible for the facts and the accuracy of the data presented herein.

The research team thanks Rafael Aldrete, Oscar Kuri, Sarai Kuri, Eun Sug Park, Lupe Ramos, Aracely Soto, Juan Carlos Villa, and Alex Valdez for their expertise and assistance in the performance of project activities.

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## EXECUTIVE SUMMARY

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Since the creation of the North American Free Trade Agreement (NAFTA) in 1994, cross border travel and trade have continued to grow at a steady rate. This growth has been mitigated by two outside occurrences that have impacted border security and economic investments. The attack on the United States on September 11, 2001 (9/11), affected border security, and the world-wide economic downturn of 2008 impacted investments along the border. Both the United States and Mexican governments have stated that they do not have additional funding to put into border infrastructure or to increase staffing levels to meet ever growing cross border traffic.

Increase in trade has provided a substantial economic boost to border communities. With the growth in volume of vehicles crossing, there is additional traffic on bridge infrastructures and adjacent roadways. Cross border congestion causes bridge saturation and increased border wait time (BWT), which add to the cost of doing business. To address these issues, the U.S. and Mexican governments are forming Public-Private-Partnerships (PPP) which have developed trusted shipper programs such as the Customs-Trade Partnership Against Terrorism (C-TPAT) and Free and Secure Trade (FAST) in the United States, and Nuevo Esquema de Empresas Certificadas (NEEC) in Mexico.

Membership in the U.S. program has remained level for a number of years. The Mexican program is relatively new. The goal of both countries is to increase membership in their trusted shipper programs with the goal of increasing border security and reducing BWT.

This research project focused on border congestion at the Bridge of the Americas (BOTA), which is a free crossing, the Ysleta-Zaragoza toll bridge, and the Santa Teresa, New Mexico, crossing. Researchers looked at current conditions and reviewed BWTs, as well as reviewed projected growth analysis to determine how these crossings were now being utilized and to consider improvements that will be needed to meet anticipated growth. The study also considered the effects of increased BWT on the status of just-in-time (JIT) inventory, supply chain security, and economic impact. We surveyed 250 cross border manufacturing and transportation companies.

TTI partnered with the Coalición Empresarial Pro Libre Comercio (CELC) to conduct a bilingual survey of 250 cross border companies obtaining 55 responses which provided a confidence level of 90% for our findings. Previous border surveys have tended to focus only on the U.S. side of the border, but this effort targeted the Mexican border crossing community, as well. Survey questions focused on awareness of trusted shipper programs' membership requirements, cost of joining trusted membership programs, and benefits of trusted shipper program membership.

The targeted audience for the survey recommendations is U.S. Customs and Border Protection Agency, Mexican Aduana (Customs), and the public and private sector who share a common goal of increasing membership in the trusted shipper programs. The survey findings may also be used to build a border crossing predictive model to provide decision-makers a new method to understand how membership in trusted shipper programs can provide economic benefits as well as reduce border congestion.

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## CHAPTER 1: INTRODUCTION

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The two primary international bridge crossings in El Paso, Texas, are quickly reaching their saturation points for commercial truck crossings. Saturation points at the Bridge of the Americas (BOTA) and the Ysleta–Zaragoza International Bridge negatively impact the economic growth of El Paso and Ciudad Juarez, Mexico, through loss of current and new business opportunities due to increased border wait time (BWT). In addition to economic issues, increased BWTs affect the quality of life and air in the border cities of El Paso and Ciudad Juarez.

U.S. Customs and Border Protection (CBP) has created trusted shipper programs that expedite border crossings and reduce BWTs resulting in a reduction of congestion for trucks, private automobiles, buses, and pedestrians. This report focuses on why shippers and manufacturers choose not to join CBP trusted shipper programs and what incentives might influence them to join.

In addition to the two international bridge crossings, the report evaluates the land border crossing at Santa Teresa, New Mexico. The report findings are based on an extensive literature review; interviews with border specialists including engineers, CBP officials, and city officials; and data obtained by conducting an electronic survey of companies that utilize these border crossings every day. A literature review was conducted to discover previous research relevant to this study. We looked at topics including but not limited to border crossings, border wait time, C-TPAT, FAST, economic development, U.S.–Mexico trade issues, ports of entry, supply chain security, just-in-time inventory, industrial parks, and finance.

In addition to the reference material found in the literature review, the professionals listed in Table 1 were contacted regarding their expertise in the El Paso/Ciudad Juarez trade, transportation, and border crossings. TTI staff either met with or spoke with these professionals to get their views on trade, transportation, and border crossings for the El Paso/Ciudad Juarez region.

**Table 1. El Paso/Ciudad Juarez Trade, Transportation, and Border Crossing Professionals.**

<i>Name Organization</i>	<i>Type of Organization</i>
Garrick Taylor Border Trade Alliance (BTA)	Private (non-profit)
Rod Hudson Customs-Trade Partnership Against Terrorism (C-TPAT)	U.S. Government/Import Businesses Partnership
Rod Hudson Customs Border Protection (CBP)	U.S. Government Agency
Bob Cook and Manuel Ochoa El Paso Regional Economic Development Corporation (REDCo)	Non-profit Business Consultant
Stephanie Caviness Foreign Trade Association (FTA)	Association of International Commerce
Erik Lee and Christopher Wilson Woodrow Wilson International Center for Scholars, Arizona State University, North American Center for Transborder Studies, Mexico Institute	U.S. Government/Private Research Center/State University
Juan Carlos Villa and Jolanda Prozzi Texas A&M Transportation Institute	State Agency/University
Said Arbri-Cherif International Bridge Director	City of El Paso

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## CHAPTER 2: LITERATURE REVIEW

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### BORDER CROSSINGS

#### Bridge of the Americas

Construction of the Bridge of the Americas was completed in 1998. It is located between El Paso and Ciudad Juarez as shown in Figure 1. The border crossing consists of two bridges that each have two lanes for commercial traffic, four lanes for passenger vehicles, and sidewalks for pedestrians (1). The BOTA is open for commercial vehicle inspection services Monday through Friday from 6:00am to 6:00pm, and on Saturdays from 6:00 to 2:00pm (1).



**Figure 1. The Bridge of the Americas (1).**

#### Ysleta–Zaragoza Bridge (Zaragoza)

The original Ysleta–Zaragoza crossing was built in 1938. It was rebuilt in 1955 and, most recently, in 1990 (2). This bridge consists of two separate bridges, one of which is a four-lane bridge dedicated for commercial vehicles. The commercial bridge has two southbound lanes, one northbound lane, and one northbound FAST (Free and Secure Trade) lane (3). The bridge charges a fare to all southbound and northbound traffic (1).

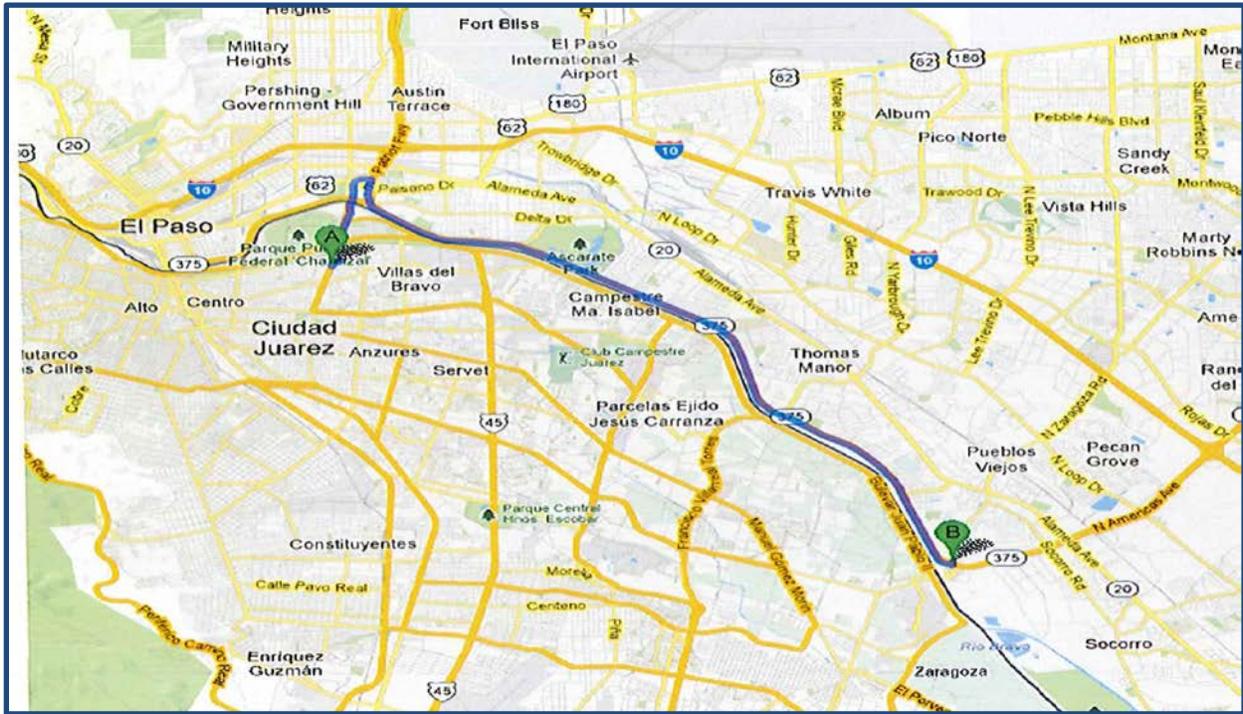
The Ysleta–Zaragoza bridge at the Ysleta Port, shown in Figure 2 is open for commercial vehicle inspection services on Monday through Friday, 6:00am to 12:00midnight and on Saturdays from 8:00am to 4:00pm (1). Commercial truck traffic shifts to this crossing every evening as the free BOTA’s inspection services close at 6:00pm weekdays and at 2:00pm on Saturdays (2).



**Figure 2. Ysleta–Zaragoza Bridge (2).**

Although some commercial traffic moves to the Ysleta–Zaragoza Bridge at night, Bob Cook with the El Paso Regional Economic Development Corporation (REDCo) indicates that the Ysleta–Zaragoza crossing is not convenient because of geographic dispersion of manufacturers and roadways. Foreign Trade Association president Stephanie Caviness agrees that, “it takes too long for industrial parks in west and central Juarez to travel east to use the Ysleta–Zaragoza Bridge crossing.” Figure 3 displays the 21.6-mile distance between the BOTA and Ysleta–Zaragoza crossings (4).

Caviness stresses that, “truckers lose 1.5 hours driving to Ysleta–Zaragoza when they can clear the BOTA in a shorter amount of time than driving to Ysleta–Zaragoza” and that “the road structure east to west is not good for traveling as most major roads head north to the border.” However, REDCo’s Bob Cook indicated in a June 2012 phone conference that “Juarez has completed a loop on the southeast side to encourage trucks to use the Ysleta–Zaragoza facility and is also constructing a new toll bridge, the Tornillio Guadalupe International Bridge scheduled for completion in 3 to 5 years.”



**Figure 3. Distance between the BOTA and Zaragoza Bridge (5).**

A proposal to reduce the hours of service at the BOTA by 4 hours was recently considered. The proposed reduction would allow the CBP to move officers from the free BOTA to the Ysleta–Zaragoza toll bridge to expand their service in an attempt to attract more users at the underutilized Ysleta–Zaragoza facility without increasing CBP officers or funding.

Border Trade Alliance (BTA) member Garrick Taylor voiced concern with the proposal indicating that, “it is not only the cost of tolls, but the increase in time to travel to the Ysleta–Zaragoza facility as it is too far away from the Maquila operations.” The Texas A&M Transportation Institute’s (TTI’s) Jolanda Prozzi in her work on the Southwest Border Infrastructure Master Plan concurred that recent interviews with members of the El Paso business community indicate that, “Maquila operators and truckers are reluctant to move away from BOTA, because of costs and the extended transportation corridor to cross at Zaragoza.” CBP El Paso office representative, Patricia Aveitia in a phone interview stated that, “the proposed change in hours at BOTA is not being well received from trade and transportation community and the Maquiladores resent the change as it impacts their level of service at BOTA.”

### **Santa Teresa Crossing**

The Santa Teresa crossing facility, built in 1997, is the newest port of entry on the U.S./Mexico border, replacing the original port that opened in 1992. Although it is located on the New Mexico/Mexico border, it is a short 20-minute drive from downtown El Paso (6). The port of entry is open for commercial traffic weekdays from 8:00am to 8:00pm and on Saturdays from 9:00am to 2:00pm. This port is known for its exportation of used vehicles and its large import/export facility for livestock on the Mexican border (6).

## BORDER WAIT TIME

Border wait time is the time it takes when traffic first queues on approach to a border crossing facility until the vehicle reaches the primary inspection booth, see Figure 4. BWT is measured through surveys, vehicle tracking, loop detectors, radar, video, radio-frequency identification (RFID), license plate recognition, and Bluetooth™ technology (7).



**Figure 4. U.S. Border Crossing Primary Inspection Booth.**

The BOTA and the Ysleta–Zaragoza crossings, along with other busy crossings, have been equipped with RFID technology. The readers gather information from RFID tags already placed on trucks crossing the border. The data reveal the time it takes a commercial vehicle to travel from a point on the south side of the border through Mexican/U.S. Customs and state safety inspections to a point on the Texas side of the border (8).

BWTs have increased significantly since the events of 9/11 (9). In a 2012 presentation at the Mexico’s Manufacturing Supply Chain Summit, it was reported that since 2010, northbound truck volumes are on the rise (10). K. Alan Russell, who runs industrial parks in Juarez for dozens of companies, states that, “bridge traffic is up sharply and follows the cycle of the U.S. economy” (11). Dr. Esther Rodriguez, Supply Chain Expert with the Texas A&M University College of Industrial Distribution states that, “as of now, there is no indication that the bridges in El Paso have become so saturated that they are negatively impacting Just in Time (JIT) deliveries.” However, BWT is “very sensitive to interruptions and congestion that can easily lead to enormous delays” (9).

BWTs taken from the U.S. Customs and Border Protection’s Border Wait Time website <http://apps.cbp.gov/bwt/> for the Bridge of the Americas and the Ysleta–Zaragoza toll bridge are shown in Tables 2 and 3 (12). Note that the wait times for the FAST lanes are significantly less than the wait times for the standard lanes on 02/28/13 on both bridges even though more standard lanes were open. Note that the BWT at the free BOTA is five times longer than that of the Ysleta–Zaragoza toll bridge. However, on 07/09/13 the wait time increased on the Ysleta–Zaragoza toll bridge. This unexpected outcome may be due to on-going construction in the area near the BOTA, an increase in manufacturing plants near the Ysleta–Zaragoza bridge, an increase in the number of FAST and standard lanes open at the Ysleta–Zaragoza bridge, and a difference in time of day the data were obtained.

**Table 2. Border Wait Times for Commercial Vehicles at the Bridge of the Americas.**

<i>Date</i>	<i>Time</i>	<i>Standard Lanes Open</i>	<i>Wait Time</i>	<i>FAST Lanes Open</i>	<i>Wait Time</i>
02/28/13	8:00AM	3	25 MIN	2	5 MIN
07/09/13	12:00PM	6	2 MIN	4	2 MIN

Source: CBP website <http://apps.cbp.gov/bwt> accessed February 28, 2013, and July 9, 2013 (12).

**Table 3. Border Wait Times for Commercial Vehicles at the Ysleta–Zaragoza Bridge.**

<i>Date</i>	<i>Time</i>	<i>Standard Lanes Open</i>	<i>Wait Time</i>	<i>FAST Lanes Open</i>	<i>Wait Time</i>
02/28/13	8:00AM	2	5 MIN	1	2 MIN
07/09/13	12:00PM	3	15 MIN	1	5 MIN

Source: CBP website <http://apps.cbp.gov/bwt> accessed February 28, 2013, and July 9, 2013 (12).

### **Causes of Increased Border Wait Time**

Although the BWT appears to have somewhat improved over the past few months, congestion will increase with growth of trade in the region. Congestion will continue to be one of the main causes of increased BWTs. Other suspected factors that contribute to increased border wait times include:

- inadequate staffing,
- increased number of trucks,
- security inspections,
- reduced funding, and
- increased fees.

BWTs also increase due to border crossings not being optimally disbursed among available capacity (13). This could be due to the cost of the tolls or the distance to the Ysleta–Zaragoza toll facility from industrial parks and manufacturers who were strategically located near the BOTA. Regardless, increases in border wait times affect manufacturers who bear costs of long and unpredictable border wait times and customs requirements each time merchandise crosses the border (14).

### ***U.S.–Mexico Trade Issues***

The North American Free Trade Agreement took force January 1, 1994; however, there are still trade issues between the U.S. and Mexico. The U.S. and Mexico agreed to partner on FAST, but participating companies must be C-TPAT certified to be a member of FAST, and many companies, especially small ones, do not have the requirements or funding for membership. Many companies do not have adequate IT systems or the training to use them. Regardless of these issues, Juan Villa of the Texas A&M Transportation Institute’s Mexico City Office indicates in a 2005 report that Mexican trade has more than doubled since NAFTA (9).

### ***Inadequate Infrastructures***

The future trade relationship between Mexico and the U.S. will require a major infrastructure to function effectively as projected truck flow for 2020 will be more than 2,200,000 (14). The infrastructure has not kept pace with expansion of bilateral trade or population growth. A bilateral effort will be required to improve infrastructure on both sides of the border (13). The U.S. Congress passed legislation making the forming of Public Private Partnerships permissible with CBP, to add additional staffing and increase facility size. Section 560 of the Consolidated and Further Continuation Act of 2013, HR-933 states that because of Federal budget restraints there is an ever increasing need to reach out to Public (city and state governments), as well as Private (air and sea carriers, sea and air port authorities, land border and bridge operators) to form Partnerships to address the need for additional staffing and improvement to facilities.

## **EFFECTS OF INCREASED BORDER WAIT TIME**

Increased BWTs directly affect drivers crossing the border; however, they also indirectly affect manufacturers, shippers, retailers, and consumers through their impact on just-in-time inventory, supply chain security, and the economy.

### ***Just-in-Time Inventory***

All manufacturers, shippers, retailers, and consumers are affected by increases in BWT. Some manufacturers and retailers have been forced to abandon their just-in-time inventory process and now lease or build warehouses to hold products to ensure their availability. This drives up product prices and also threatens the supply chain security as warehoused goods become a target for taxing bodies as well as increasing the security risk.

## **Supply Chain Security**

Security is essential in the world today with daily threats of terrorism in the U.S. and abroad. El Paso and Ciudad Juarez do not escape those threats but also are affected by drug cartels that produce and smuggle illegal drugs into the U.S. Trucks need to keep moving to ensure the safety of the driver and the load. The supply chain must also be carefully monitored, and manufacturers must keep their products and warehouses secure and free from illegal contraband. Therefore, it is essential that not only drivers but supply chain partners be C-TPAT certified (15).

## **Economic Impact**

Increased BWTs cost the U.S. and Mexico economies billions of dollars each year (14). The El Paso Port of Entry is the second largest southern land border port by value, and trade has increased by 100% over the past 12 years (13). The economic impact of increased BWTs currently results in the loss of \$1.5 billion in output, \$400 million in wages, \$200 million in tax revenue, and 6700 lost jobs (13) per year. It is estimated that the economic impact due to BWT will double by 2017 if delays continue to grow and the infrastructure and facility operation remain the same (13).

The Woodrow Wilson International Center for Scholars reports that longer and unpredictable border wait times cut away at the competitiveness of regional industries causing many U.S. and Mexican factories to be offshored to Asia (14). This negative economic impact is also conveyed in a report commissioned by the U.S. Department of Commerce's International Trade Administration. The report suggests that the economic impact of border wait times will more than double by 2017 as delays grow and if projected infrastructure and operations remain the same (13).

## **Trusted Shipper Programs**

Trusted shipper programs include the Customs-Trade Partnership Against Terrorism (and the Free and Secure Trade programs).

### **Customs-Trade Partnership Against Terrorism (C-TPAT)**

C-TPAT was established after the 9/11 attacks to improve security and expedite flow of goods crossing the border coming into the United States. It is a "voluntary initiative between the U.S. Customs and Border Protection (CBP) and private business which builds relationships that strengthen international supply chains and improve U.S. border security" (16).

**Membership Benefits.** C-TPAT membership benefits include the following:

- fewer border delays,
- front line processing in case of inspections,
- good security practices and procedures,
- better supply chain integrity,
- reduced risk mitigation,

- reduced cargo theft,
- stronger brand equity,
- improved asset utilization,
- higher workforce security,
- better marketability,
- better understanding of the supply chain process and agents,
- training seminars,
- continued processing during terrorist attack,
- increased work and customers, and
- access to FAST lanes.

Many local industry practitioners claim that, “the market requires C-TPAT membership and that non-compliance usually results in loss of clients” (15). According to Sarai Kuri of CELC, many of the companies she works with are “proud and take pride in their C-TPAT memberships.”

### ***Free and Secure Trade (FAST)***

The Free and Secure Trade program was also established following 9/11. It is a “commercial clearance program for known low-risk shipments entering the U.S.” (3). FAST is a joint initiative that partners United States and importers to move pre-approved eligible goods across the border quickly by verifying trade compliance away from the border (17). Participation in the FAST program requires that, “every link in the supply chain, from manufacturer to carrier, to driver to importer must be certified under the C-TPAT program” (3).

**Membership Benefits.** FAST membership/enrollment benefits include the following:

- dedicated FAST lanes,
- increased shipment processing speeds,
- reduced inspections,
- front of line processing for inspections,
- enhanced supply chain security, and
- FAST Commercial Driver Card.

### ***Nuevo Esquema de Empresas Certificadas (NEEC)***

In 2010, Mexican Customs created a pilot security program called NEEC with a membership cost of \$21,800 Mexican Pesos per company. NEEC became official in 2011. In January 2012, NEEC made changes that required current members to become re-certified to meet increased security requirements. This was done to make NEEC membership requirements compatible with C-TPAT membership requirements. The new requirements for NEEC include:

- physical security,
- access controls,

- business partners,
- procedural security,
- Mexican Customs conveyance security,
- personnel security,
- IT security,
- security trainings,
- incident investigation, and
- supply chain security.

Companies eligible for membership include:

- manufacturing companies,
- maquiladoras (twin plant production assembly sites prescribed by NAFTA),
- export businesses, and
- Mexican carriers.

Currently there are 338 manufacturing companies certified in NEEC and 136 companies in the process of joining. There are currently only three carriers in the process of joining the program. The Mexican government is currently conducting seminars and conferences to market the advantages of joining their trusted shipper program. The stated goal of this security program is to make it compatible to the U.S. trusted shipper programs of C-TPAT and FAST. The desired outcome of matching the two countries' trusted shipper programs is to: increase border security, reduce BWT, and reduce the cost associated with each country maintaining two separate trusted shipper programs. NEEC would like to be officially recognized by C-TPAT and be able to certify companies in Mexico for C-TPAT membership. The U.S. CBP is currently evaluating the NEEC program to determine its validity and effectiveness.

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## **CHAPTER 3: WHY TRUSTED SHIPPER PROGRAMS ARE NOT BEING USED**

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The literature review suggests several reasons for companies not becoming members of trusted shipper programs. In addition, meetings with private companies and government agencies experienced with border crossing issues revealed and confirmed some of the suspect reasons as: cost to join and maintain membership, requirements to join, time to process paperwork and prepare for membership, and not enough staff available to prepare and maintain requirements for membership.

### **COST OF TRUSTED SHIPPER PROGRAM MEMBERSHIP**

Business expenses associated with manufacturing, warehousing, transportation, and distribution of cross border cargo are high. Any new or additional cost of doing business cuts into already low profit margins. Even a small additional cost to doing business can be detrimental to keeping border crossing companies operating. Some of the initial costs incurred in joining a trusted shipper program include: hiring new staff, training new and current staff, improving or building new infrastructure, and improving or purchasing new IT systems (15).

In addition to initial costs, recurring costs to membership include: maintaining physical site and equipment; updating IT systems; implementing and developing physical and staff security processes; and increasing work for staff members including the preparation, inspection, and reporting of current trusted shipper program procedures. There is also a cost to research new trusted shipper procedures as they arise and/or change frequently. In addition, there are initial application fees, filing transaction fees, and border crossing fees.

Although any increased cost affects all companies, it appears the cost of the trusted shipper programs affect large and small companies in different ways. This is represented in the 2011 Customs-Trade Partnership Against Terrorism's Costs & Savings Survey where the implementation costs ranged from \$280 to more than \$4 million U.S. dollars; and the maintenance costs ranged from \$45 to \$815,000 (4).

#### **Large Companies**

An example of a large cross border company is one which became a C-TPAT member in 2001 at an initial cost of approximately \$200,000. The company indicates that it spent approximately \$112,500 annually to maintain its membership. This investment represents an additional cost to border crossing companies; however, upon membership the company began saving almost immediately due to decreases in truck inspections. Their inspection rate of 7.6% in 2001 dropped to 0.66% in 2003, representing a savings of \$550,000 per year (15).

#### **Small Companies**

Small companies believe they cannot afford the high application fees and maintenance of security standards for membership to trusted shipper programs. Small companies contend that

they cannot afford the specialized security staff, IT system, new infrastructure to comply with safety and security processes, and the cost to research new developments in trusted shipper programs. In a conversation with President of the Foreign Trade Association in El Paso, Stephanie Caviness agreed and stated that, “the cost associated to join C-TPAT and FAST is too much for smaller and mid-sized companies.”

In a May 2013 meeting with Bob Gray, Toby Spoon and John Rippe of Secure Origins it was suggested that many of the El Paso/Ciudad Juarez businesses and maquiladoras have been led to believe that the cost to join a trusted shipper program is much more than the actual cost. They suggest that most of the companies already have enough security and staff in place to join without incurring additional expenses. Mr. Spoon suggested that what the businesses need is to be educated on the requirements, benefits, and costs of the trusted shipper programs. He suggested that the trusted shipper program costs need to be presented to the correct person in each business, and in multiple languages if necessary, so they completely understand that program membership may not cost as much as they perceive. Companies who are non-members of trusted shipper programs state that they do not believe the program membership’s benefits are worth the cost.

## **OTHER DETERRENTS TO TRUSTED SHIPPER MEMBERSHIP**

Another deterrent to trusted shipper membership is the actual membership application process. The application to join C-TPAT is a long process taking about 1 year from start to finish. The actual application is 30 pages in length. In addition, warehouses and business partners of the applicant are asked to complete an 11-page questionnaire regarding security issues or prove they meet C-TPAT security criteria, usually done through audit procedures. Even after initial membership there are monthly security meetings and processes to implement, update, and/or change.

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## CHAPTER 4: SURVEY DOCUMENT AND RESULTS

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A survey document (see Appendix) was developed and distributed to trucking companies; logistics service providers; manufacturing companies; customs brokers; importers; and Maquiladoras, which are also known as “Twin-Plant operators and are provided for in NAFTA. Maquiladoras are Mexican assembly or manufacturing plants that “operate 330+ plants and employ more than 178,000 workers in Juarez” (15). It is not surprising that Juarez is birthplace of the maquiladora industry (18) having “the top ten Maquila industries in Juarez and almost all of the top 20 suppliers in El Paso” (19).

TTI teamed with Sarai and Oscar Kuri of the Coalición Empresarial Pro Libre Comercio to develop the survey to determine if the survey participants are members of any of the trusted shipper programs. CELC is a privately held company in El Paso, Texas, that works with manufacturers, brokers, drivers, shippers, and maquiladoras to help them with the requirements to join trusted shipper programs such as C-TPAT and NEEC. It was very helpful having them team with TTI, as they have many contacts in the trucking industry and they both speak English and Spanish, and it was vital to get representatives from both U.S. and Mexican companies. The surveys were prepared in SurveyMonkey<sup>®</sup>, and survey links were emailed from CELC as they are a respected and well-known organization in the El Paso/Ciudad Juarez region. CELC employees acted as facilitators of the survey by promoting participation at local events, by e-mail, through Internet connectivity, and by telephone. They agreed to how the survey was to be conducted and to their designated role. CELC representative Sarai Kuri’s experience in teaming with TTI on the survey follows:

“Our experience conducting the C-TPAT survey with TTI was very enriching. We sent out the survey to 250 of our clients, including manufacturers, carriers, importers, and U.S. Brokers all of which use or are planning on using the benefits of C-TPAT. We believe we had a positive response from our membership. Several members are interested in the survey results and some of them even shared the survey with other companies. We sent out e-mails with the survey and followed up with our clients via telephone and e-mail. We are looking for answers to the following questions:

- What makes the industry participate in these programs?
- Are companies certified to obtain the benefits of border cross times?
- Are the companies participating in order to increase their security?

Our goal is to increase the participation of the industry in these programs. To do that we need to know the real reasons they do or do not participate in them and how they feel about them.

I believe the results to the survey when given were positive. The results showed the number one reason people get C-TPAT certified is to improve marketability followed by improved border wait times. I found these surveys interesting and received real answers that provide insight into membership to these important programs.”

## SURVEY RESPONSE

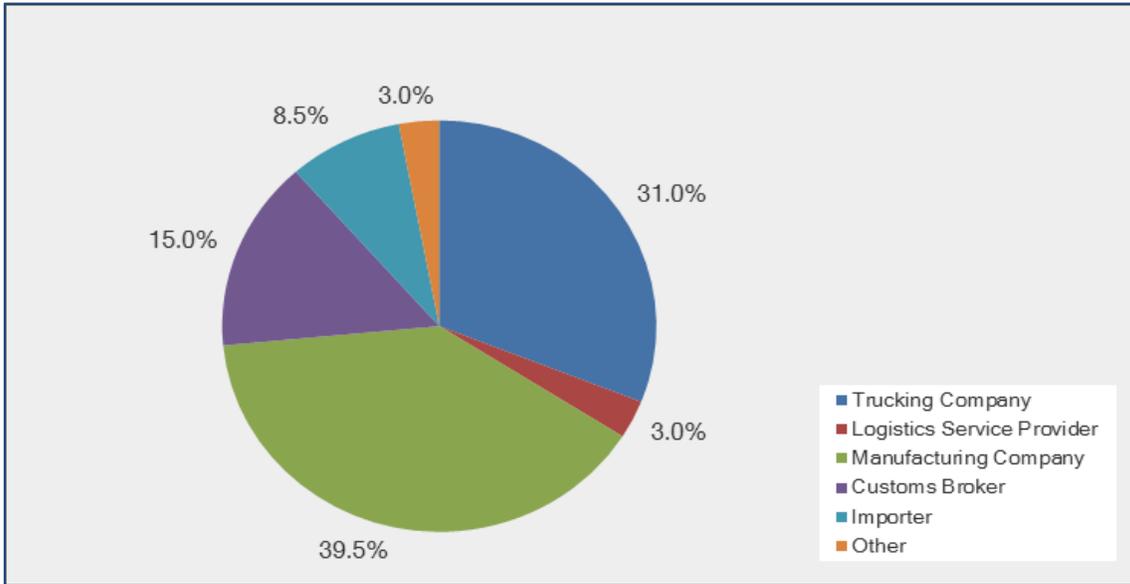
The survey asked questions concerning: knowledge of membership requirements, costs of membership, and program benefits. The survey was available in English and Spanish with versions for trusted shipper program members and non-members. CELC’s assistance in distributing the survey was vital in reaching the companies from Juarez. It was important for us to survey both Mexican and U.S. companies. Table 4 shows the combined response rate of all four versions of the survey document. Eun Sug Park, a statistician with TTI, determined the number of survey participants needed to maintain a reasonable confidence level and margin of error for the survey.

**Table 4. Survey Response Rate.**

C-TPAT Survey Information	
Surveys Sent	250
Total Surveys Received	55
English Surveys Received	16
Spanish Surveys Received	39
Confidence Level	90%
Margin of Error	9.81%

As shown in Table 4, the Spanish survey response to the survey was 71% compared to 29% for the English surveys. This response indicates that the data found will be a clear view of what Mexican companies know about the trusted shipper programs and their views on BWTs.

Figure 5 shows the percentage of survey participants by company type. Note that manufacturing and trucking companies were the top two respondents to the survey with 39.5 and 31.0%, respectively. The next highest responding company was customs brokers with a 15% response rate. These business types represent 85% of those surveyed. The low response rate of importers, logistic service providers, and others representing a total of 14.5% suggests that the data from these groups may not be representative of the group as a whole. Therefore, most conclusions drawn from this survey will represent manufacturing companies, trucking companies, and customs brokers. Maquiladoras are included in manufacturing companies; however, one maquiladora listed itself as in the “other” category.

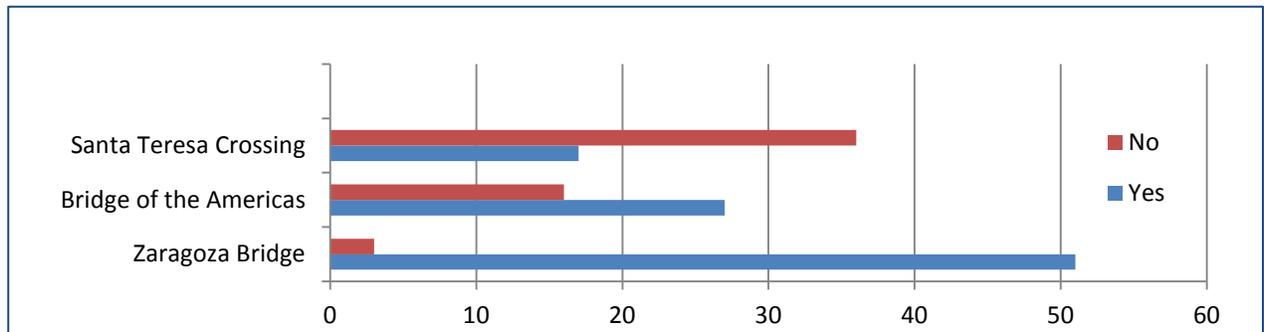


**Figure 5. Survey Participants by Company Type.**

## BORDER CROSSING

The border crossing facilities used in the El Paso/Ciudad Juarez area include the Bridge of the Americas, the Ysleta–Zaragoza toll bridge, and the crossing at Santa Teresa. Figure 6 displays the facilities’ use by survey participants that commonly cross to and from Mexico into the United States. The figure addresses the following questions:

- Do you use the border crossing at the Bridge of the Americas (BOTA)?
- Do you use the border crossing at the Ysleta–Zaragoza toll bridge?
- Do you use the border crossing at Santa Teresa?



**Figure 6. Border Crossing Use by all Survey Participants.**

The responses to Figure 6 were surprising as 93% of the respondents indicated they use the Ysleta–Zaragoza toll bridge compared to 49% who use the BOTA. Our literature review and

meetings with experts in the region indicated that the BOTA was used more often than the Ysleta–Zaragoza toll bridge as the BOTA is free and there is a toll charge on the Ysleta–Zaragoza Bridge. This was the case when our study began in September 2012; however, due to on-going road construction in Mexico, adjacent to the BOTA, and the increase in manufacturing near the Ysleta–Zaragoza Bridge crossing, the trend changed and the survey reflects more use for the toll bridge. These responses indicate that at some point, time becomes more important than cost in deciding which border crossing route to use.

Table 5 displays the border crossing facility use by company type. The only significant finding by company type is that 96% of all the manufacturing companies now use the Ysleta–Zaragoza toll bridge compared to 54% who also use the BOTA. Once again, the toll bridge is now being used more often even though there is a toll charge.

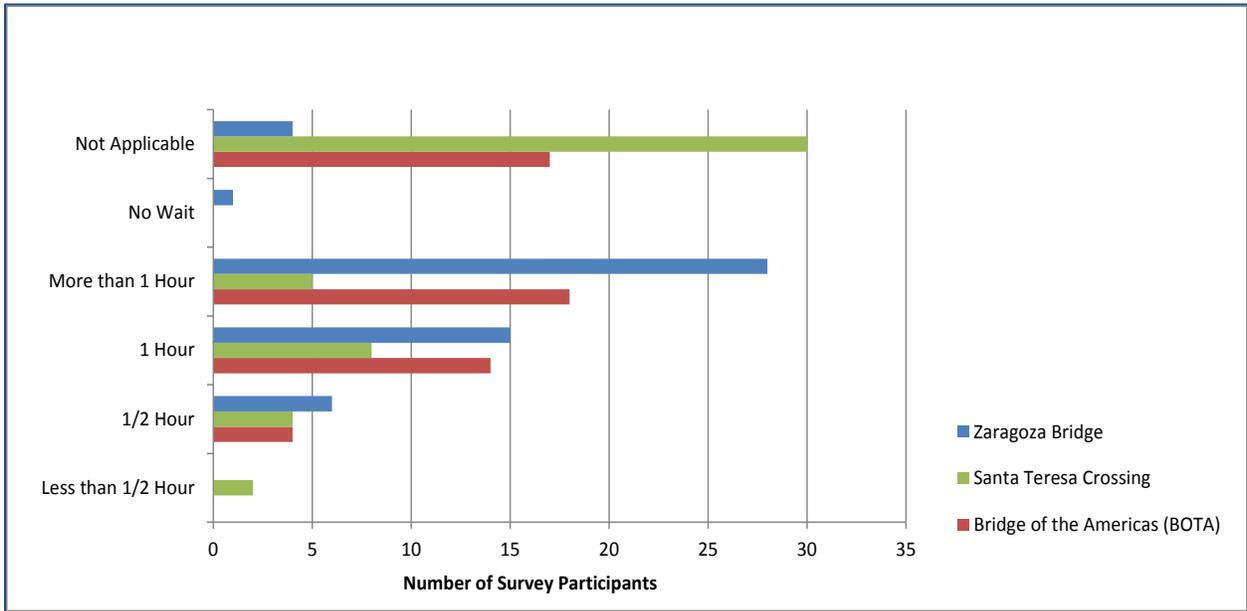
**Table 5. Border Crossing Use by Company Type.**

<i>Company Type</i>	<i>Bridge of the Americas</i>		<i>Santa Teresa</i>		<i>Ysleta-Zaragoza Bridge</i>	
	<i>Yes</i>	<i>No</i>	<i>Yes</i>	<i>No</i>	<i>Yes</i>	<i>No</i>
Trucking Company	13	5	8	7	14	4
Logistics Service Provider	1	1	0	2	2	0
Manufacturing Company	13	11	5	19	23	1
Customs Broker	6	2	4	4	7	1
Importer	3	2	0	5	4	1
Total	36	21	17	37	50	7

At the beginning of this research effort in the fall of 2012, the Bridge of the Americas was the primary border crossing to the United States from Mexico. The data above clearly show increased use of the Ysleta–Zaragoza Bridge. Border wait times also changed since the beginning of the study.

## **BORDER WAIT TIME**

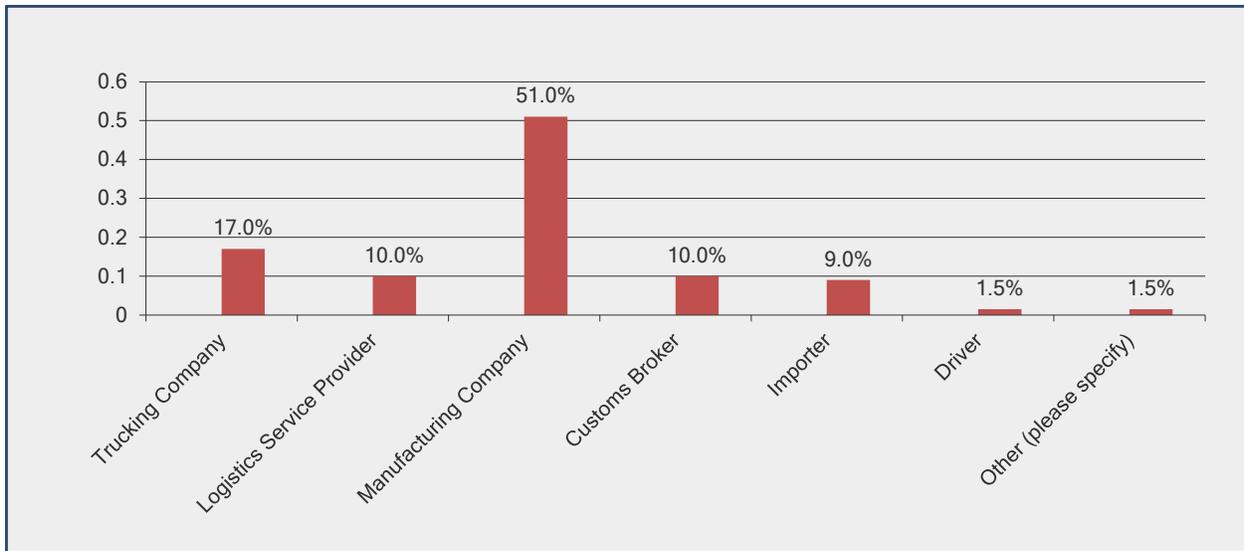
Figure 7 displays the survey participants’ perceived BWT at the BOTA and Ysleta–Zaragoza Bridge. It is interesting that 40% of those responding perceived BWT to be more than 1 hour at the Ysleta–Zaragoza Bridge compared to the free BOTA where BWT of more than 1 hour was perceived as 27%. Since the perceived BWT appears to be longer at the Ysleta–Zaragoza facility, it is interesting that the participants continue to use this facility as there is no perceived time saving benefit over using the BOTA and drivers also must pay a toll. This leads us to consider who, when, and why certain border crossings are selected.



**Figure 7. Perceived Border Wait Time at the BOTA and Ysleta–Zaragoza Bridge.**

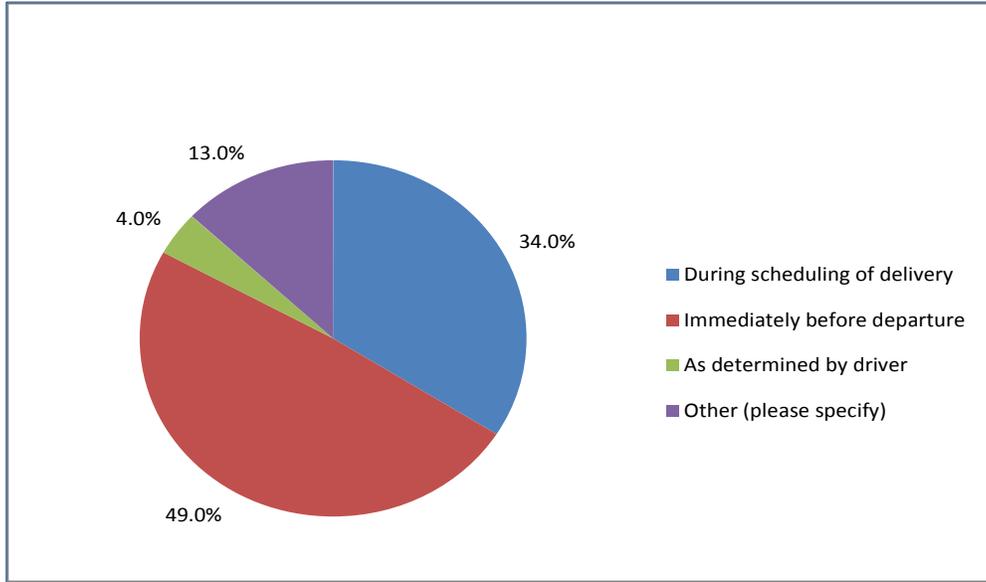
### BORDER CROSSING ROUTES

Figure 8 displays which entity determines the border crossing route. Again, please note that 39.5% manufacturing and 31% trucking companies represent over 70% of the survey participants. Over 50% of the time, manufacturing companies select the route drivers are directed to take when crossing the border making them the most common entity for determining initial trip routes. Trucking and customs broker companies determine border crossing routes 27% of the time, followed by logistics service providers who determine routes 10% of the time.



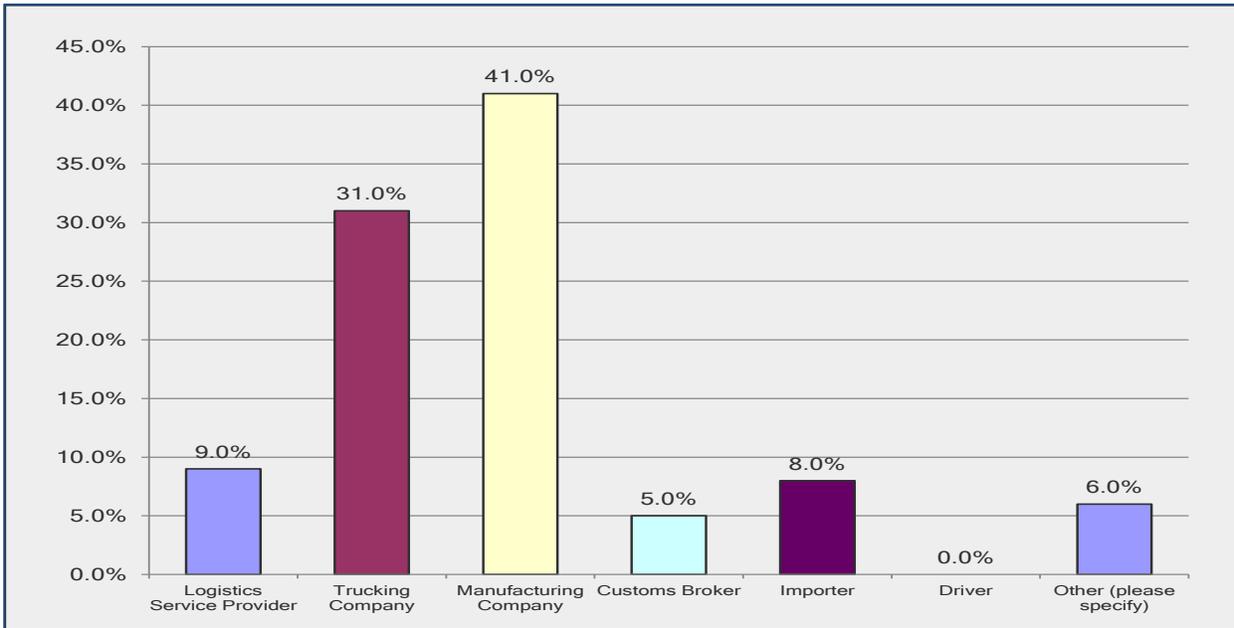
**Figure 8. Who Determines Border Crossing Routes.**

The chart shown in Figure 9 illustrates when border crossing routes are determined. As shown, 49% selected that travel route and border crossing is determined immediately prior to departure. This allows for monitoring of current conditions such as weather and traffic to aid in selecting the best, safest, and fastest travel route and border crossing facility. It is surprising that 34% of the routes are determined during scheduling without consideration of current conditions.

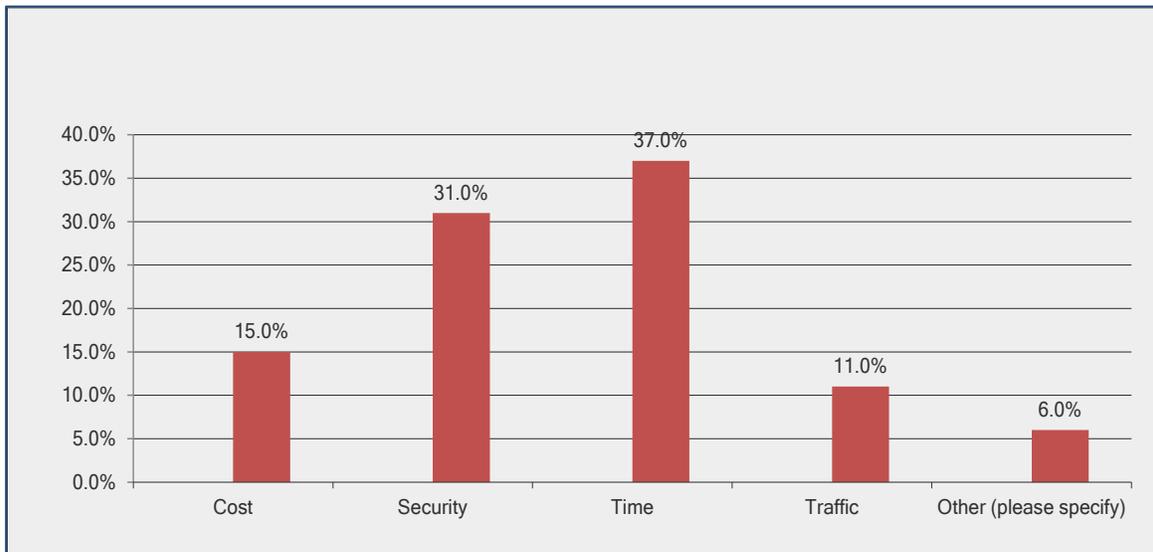


**Figure 9. When Travel Routes and Border Crossings Are Determined.**

Survey participants were asked who determines route and/or border crossing facility changes should they need to be made after a trip has already begun. As shown in Figure 10, the manufacturing and trucking companies most often make those route changes with 41 and 31%, respectively. This is not surprising as over 70% of the survey respondents were manufacturing and trucking companies. The top three determining factors for selection of route and border crossings as indicated in Figure 11 are time, security, and cost.



**Figure 10. Entity Responsible for Determining Route and/or Border Crossing Changes After Trip has Begun.**



**Figure 11. Factors Considered When Selecting Border Crossing Routes.**

## EXPORT QUESTIONS

### Number of Trips

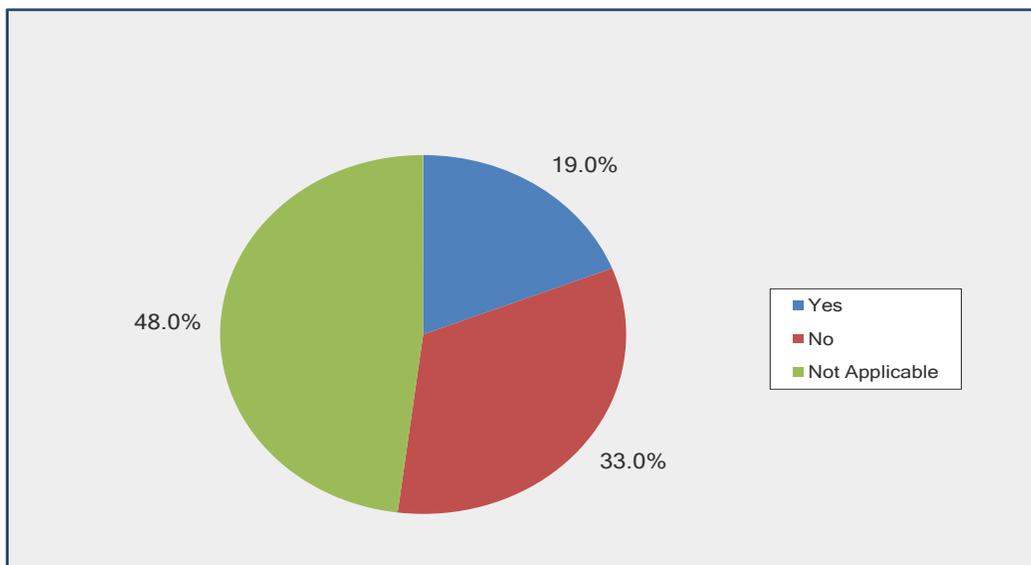
The number of export trips that survey participants take per week is shown in Table 6. Since most trucks can make 2.5 trips across the border per day, we used this number to determine the size of the company responding to the survey. The options given on the survey included: 1–5, 6–10, 11–20, 21–40, and over 40. Based on this structure, 1–5, 6–10, and 11–20 are small companies. Medium companies are 21–40, and those over 40 are considered large companies. Table 6 displays the number of exports per week and the assigned size of company.

**Table 6. Exports per Week and Assigned Company Size.**

Exports Per Week	Number of Respondents	Company Size
<i>1 – 5</i>	8	Small
<i>6 – 10</i>	11	Small
<i>11 – 20</i>	8	Small
<i>21 – 40</i>	13	Medium
<i>Over 40</i>	12	Large

### Warehousing of Goods

Warehousing by companies prior to export is displayed in Figure 12. As can be seen, less than 20% of the surveyed companies warehouse goods. This indicates that at least these companies, which are primarily manufacturing and trucking companies, are not yet experiencing problems with just-in-time inventory.



**Figure 12. Company Use of Warehousing Prior to Exportation of Goods.**

## TRUSTED SHIPPER MEMBERSHIP QUESTIONS

### Qualifications for Membership

To determine the membership qualifications of survey participants the following questions were included in the survey:

- Are you familiar with supply chain guidelines?
- What certifications does your company have?
- Do you have a Certification of Incorporation?
- Do you have MID, DOT, Broker Serial or Broker Filer Numbers?

The non-C-TPAT member survey participants were asked if they were familiar with the requirements and the supply chain guidelines required for membership to C-TPAT. As shown in Table 7, 80% of the non-C-TPAT members responding to the survey indicated they were familiar with the membership and supply chain guidelines needed to become C-TPAT certified.

**Table 7. Requirements and Supply Chain Guidelines Needed for C-TPAT Membership.**

Non-Members Response	C-TPAT Requirements	Supply Chain Guidelines
Yes	12	12
No	3	1

Table 8 presents the certifications held by C-TPAT members and non-members. NEEC is the Mexican version of C-TPAT. The other certifications include carrier, cart men and warehouse permits, and licenses. Note that of the 15 non-C-TPAT members, only 2 currently held any of the certifications needed for membership.

**Table 8. Certifications Held by C-TPAT and Non-C-TPAT Members.**

Company Certifications	C-TPAT Members	C-TPAT Non-Members
Coalition for Free Commerce (CELC)	37	2
Nuevo Esquema de Empresas Certificadas (NEEC)	7	0
Certificate of Incorporation	n/a	0
Other (please specify)	17	2

Table 9 displays the different types of identification numbers held by non-members and the percentage of non-members that have them. The other category represents state and local permits and licenses. Some of these identifications are needed for various trusted shipper program memberships.

**Table 9. Percent of Non-C-TPAT Members with Identification Numbers.**

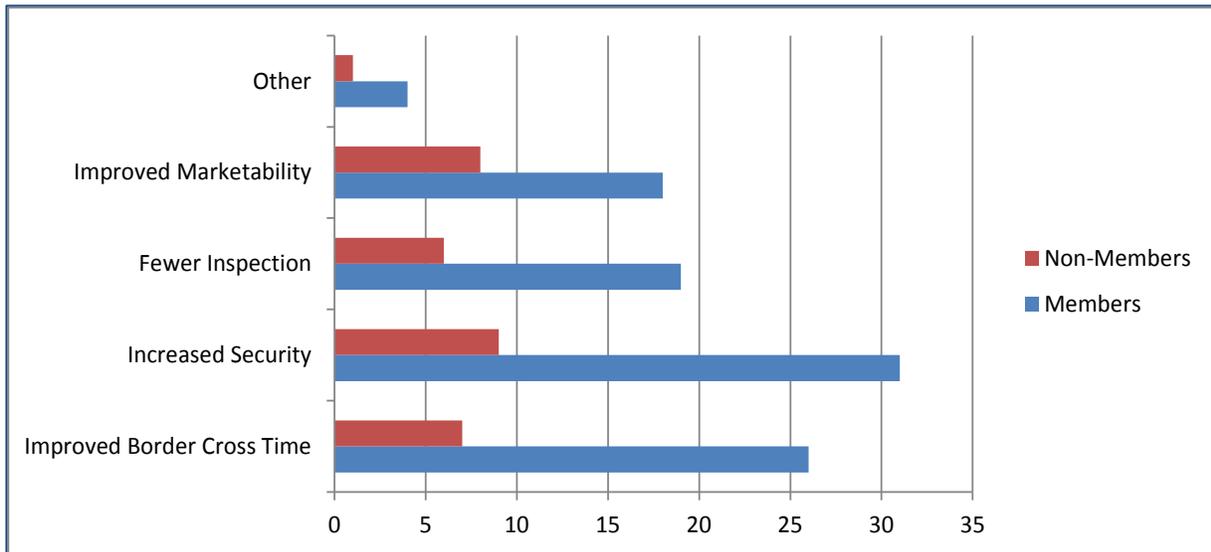
Types of Identification (ID) Numbers	Percent of Non-Members with ID Numbers
MID – Manufacturing	45
DOT – Department of Transportation	18
Broker Serial	24
Broker Filer	27
Other	18

**Membership Benefits**

To determine membership benefits received by members and membership benefits expected by non-members, the following questions were included in the survey:

- What benefits would you expect to receive if you are not a member?
- What benefits have you received if you are a member?
- Does membership meet its objectives?
- Does the cost of membership equal or exceed its benefits?
- Are there additional benefits you would like included in membership?
- Would you recommend membership to a non-member?
- If you are not a member why have you not joined?

Figure 13 displays common benefits expected by trusted shipper program members and non-members.



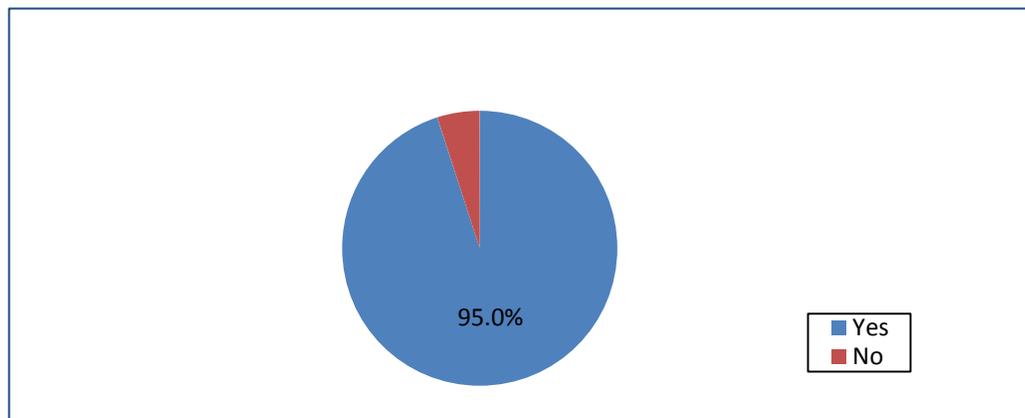
**Figure 13. Membership Benefits Received by Members and Expected by Non-Members.**

As shown in Figure 13, increased security and improved border cross times were cited as the top two benefits for trusted shipper program members. Non-members selected increased security and improved marketability as their top two responses. It is possible that marketing toward the perceived benefits of non-members and advertising the benefits cited by members may help to increase membership.

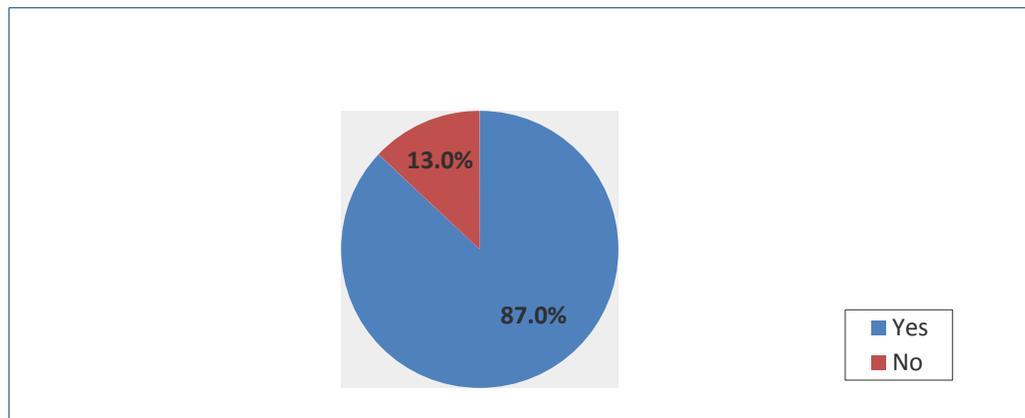
The final questions focused on cost of membership versus benefits received. Members of trusted shipper programs were asked the following questions:

- Does membership meet its objectives?
- Does the cost of membership equal or exceed its benefits?
- Would you recommend membership to a non-member?

Figure 14 indicates that 95% of C-TPAT members from the survey believe that membership meets its objectives. Figure 15 indicates 87% believe that the benefits meet or exceed its costs. Finally, 100% of those members responding to the final question responded that they would recommend membership to a non-member.



**Figure 14. C-TPAT Members Indicating Membership Meets Objectives.**



**Figure 15. C-TPAT Members Indicating Benefits Meet or Exceed Costs.**

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## CHAPTER 5: CONCLUSIONS AND RECOMMENDATIONS

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When our study began, former El Paso Mayor John Cook's Border Task Force stated that there was concern with bridge saturation and increased BWT at both main border crossings between the United States and Mexico. Mayor Cook commissioned a work group to study border crossing issues including: Model Commercial Port Project-21 and Frontera 21 Trusted Shipment Risk Segmentation Lane. There were a number of suggestions that came out of the Mayor's border task force that were implemented about the same time TTI was conducting its study. When we started our study, fewer companies were utilizing the Ysleta-Zaragoza toll bridge than the BOTA. There was even a proposal suggested by the Customs and Border Protection to limit the number of hours of service at the BOTA, in order to entice more commercial traffic to the Ysleta-Zaragoza toll bridge. This proposal was met with a great deal of "push-back" from the El Paso/Ciudad Juarez trade and transportation community and was not implemented.

The Mayor's border task force also looked at ways to increase enrollment in the trusted shipper programs, C-TPAT and FAST. While our survey was being conducted, the Mayor took action to relocate commercial traffic from the BOTA to Zaragoza. There was a reduction in bridge saturation and BWT. There were also changes being made on the Mexican side of the border to introduce Frontera 21, which segmented C-TPAT and FAST commercial traffic. This effort also resulted in less BWT and more streamlined border operations.

When our survey was concluded, use of the Ysleta-Zaragoza toll bridge had surpassed that of the free BOTA. There were also a number of road construction projects at the same time in Juarez that caused additional commercial truck traffic to shift away from the BOTA to Zaragoza. There was a new bypass loop constructed in Juarez, which reduced transit time on the Mexican side to the Ysleta-Zaragoza toll bridge. In addition, manufacturers began to open new plants and warehouses near the Ysleta-Zaragoza toll bridge.

These changes, instituted on both sides of the border, created a temporary fix for the current congestion and long BWTs at the BOTA. However, our findings indicate that the projected growth of business will, in a short time, overtake these short-term changes. It will not be long until the BOTA and the Ysleta-Zaragoza Bridge become saturated again. The most current U.S. Government General Accountability Office (GAO) report, dated July 2013 and entitled CBP Action Needed to Improve Wait Time Data and Measure Outcomes of Trade Facilitation Efforts, substantiates our findings about the need to prepare for future border growth (20).

The negative economic impact due to BWT is estimated to more than double by 2017 as delays grow and projected infrastructure and operation remain the same (13). All the crossings at the El Paso/Ciudad Juarez border will become saturated if nothing is done. The Federal government has stated that due to budgetary cutbacks it will not provide additional funds for infrastructure improvements. Many companies have relocated their manufacturing plants from Asia to the border, for more efficient and cost-effective manufacturing and shorter supply lines to the U.S. markets. El Paso and Ciudad Juarez cannot afford to lose the new business from Asia, nor stifle economic growth in the region due to increased border delays.

## RECOMMENDATIONS AND CONCLUSIONS

This study recommends improving BWTs at all the El Paso/Ciudad Juarez border crossing through increased membership to trusted shipper programs such as C-TPAT, FAST, and NEEC. Through our research and survey we have determined the following:

- TTI should partner with other public and private entities, such as CELC, City of El Paso, Secure Origins, and selected customs house brokers and freight forwarders to develop a strategy for increasing participation in the trusted shipper programs.
- Dependent upon corporate structure, there a number of different people and departments responsible for decision-making in manufacturing and trucking companies.
- There is need to focus our trusted shipper program marketing strategy to the correct level of decision-makers. This can be accomplished by partnering with entities such as CELC and Secure Origins.
- Because of the defuse decision-making process, it is difficult to determine who to target to discuss joining trusted shipper programs, which is one of the primary reasons to partner with entities who have closer ties to the manufacturing and transportation community than TTI.
- There is a need to educate manufacturing and trucking companies, especially small and medium sized companies, as there appears to be some confusion to the costs and guidelines for membership.
- Recommend restructuring trusted shipper program cost and/or bridge tolls so that small and medium sized companies can afford membership.
- Recommend price structuring changes to tier border crossing for multiple crossers. For example, reduce fees for maquiladoras that make multiple crossings per day (13).
- Recommend establishing a program to reduce bridge tolls for empty trucks.
- Establish an outreach with PPP associates to encourage information sharing and alignment of different agencies including City, State, CBP, and Mexican government.

The above efforts should be effective in increasing C-TPAT and other trusted shipper program memberships and in reducing BWTs. Working together to form PPPs is the recommended method for addressing growing border congestion. Bridges will require maintenance and expansion and the governments cannot fund this alone. As cross border business continues to grow, better traffic management solutions are needed to keep the border flowing.

President Barack Obama in a preamble to the 2012 National Strategy for Supply Chain Security states,

“A bilateral effort is required to improve infrastructure on both sides of the border. Partnerships with state, local, and tribal governments, the private sector, and the international community are critical to realizing our shared goal of building a new framework to strengthen and protect this vital system” (21).

This is what needs to happen in the border region of El Paso/Ciudad Juarez; the City, the County, the CBP, the Mexican government, and private companies need to work together to improve infrastructure and staffing levels, align trusted shipper programs, and share information to enhance and grow the economy.

TTI has a continued role in researching the current state of border conditions and making recommendations to improve the future flow of traffic along the border. In addition, TTI has a role in forming and joining PPPs to share in the future of cross border growth.

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# APPENDIX

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## English Version of C-TPAT Member Survey

### C-TPAT Membership Incentives Survey - Members

#### Thanks for taking our survey!

The Texas A&M Transportation Institute in cooperation with the Coalition for Free Commerce (CELC) and the Border Trade Alliance (BTA) would like to thank you for taking your time to complete this survey.

Through this survey, we hope to determine your needs in order to recommend and initiate changes to improve your travel time, border wait time, and security.

If you would like to receive a copy of survey results please contact Brenda Manak by email at [b-manak@tamu.edu](mailto:b-manak@tamu.edu) or Sarai Kuri by email at [skuri@celc-tat.com.mx](mailto:skuri@celc-tat.com.mx).

#### Let's Begin!

**1. What is your primary type of business?**

Trucking Company

Logistics Service Provider

Manufacturing Company

Customs Broker

Importer

Other (please specify)

**2. Do you or your drivers use the Toll Bridge at Zaragoza?**

Yes

No

**3. Upon arrival at the Zaragoza Toll Bridge, what is the average Border Wait Time to cross into the U.S.?**

Less than 1/2 Hour

1/2 Hour

1 Hour

More than 1 Hour

No Wait

Not Applicable

## C-TPAT Membership Incentives Survey - Members

**4. Do you or your drivers use the Bota Bridge?**

- Yes  
 No

**5. Upon arrival at the Bota Bridge, what is the average Border Wait Time to cross into the U.S.?**

- Less than 1/2 Hour  
 1/2 Hour  
 1 Hour  
 More than 1 Hour  
 No Wait  
 Not Applicable

**6. If the Bota Bridge was closed, would you be more likely to use the Zaragoza Bridge?**

- Yes  
 No  
 Not Applicable

**7. Do you or your drivers use the border crossing at Santa Teresa?**

- Yes  
 No

**8. Upon arrival at the Santa Teresa Border Crossing, what is the average Border Wait Time to cross into the U.S.?**

- Less than 1/2 Hour  
 1/2 Hour  
 1 Hour  
 More than 1 Hour  
 No Wait  
 Not Applicable

## C-TPAT Membership Incentives Survey - Members

### 9. Who determines the travel route when crossing the border?

- Trucking Company
- Logistics Service Provider
- Manufacturing Company
- Customs Broker
- Importer
- Driver

Other (please specify)

### 10. What factors are considered when choosing a border crossing route?

- Cost
- Security
- Time
- Traffic

Other (please specify)

### 11. When is the travel route and border crossing determined?

- During scheduling of delivery
- Immediately before departure
- As determined by driver

Other (please specify)

## C-TPAT Membership Incentives Survey - Members

### 12. Should travel route need to be changed during transit, which person/entity makes the route change decision?

- Logistics Service Provider
- Trucking Company
- Manufacturing Company
- Customs Broker
- Importer
- Driver

Other (please specify)

### 13. Approximately how many truck export shipments does your company conduct per week?

- 1-5
- 6-10
- 11-20
- 21-40
- Over 40

### 14. If you are a manufacturing company, does your company use storage or warehousing prior to exporting shipments?

- Yes
- No
- Not Applicable

### 15. Which of the following certifications do you or your company hold?

- Coalition for Free Commerce (CELC)
- Nuevo Esquema De Empresas Certificadas (NEEC)

Other (please specify)

## C-TPAT Membership Incentives Survey - Members

### 16. What benefits have you received through your C-TPAT Membership?

- Improved Border-Cross Time
- Increased Security
- Fewer Inspections
- Improved Marketability

Other (please specify)

### 17. Does C-TPAT membership meet its objectives?

- Yes
- No

If No (please explain)

### 18. Does the cost of joining C-TPAT equal or exceed its membership benefits?

- Yes
- No

### 19. What additional benefits would you like to see included in C-TPAT membership?

### 20. Would you recommend C-TPAT membership to a non-member?

- Yes
- No

Why or why not? (Please Specify)

We sincerely appreciate your completion of this survey. Thank you!

## Equesta de C-TPAT miembros incentivos para los miembros

La Texas A & M transportes Instituto en cooperación con la coalición de libre comercio (CELC) y la Alianza de comercio fronterizo (TBA) quisiera darle las gracias por tomar su tiempo para llenar esta encuesta.

A través de esta encuesta, esperamos determinar sus necesidades con el fin de recomendar e iniciar cambios para mejorar su tiempo de viaje, el tiempo de espera de la frontera y la seguridad.

Si desea recibir una copia de los resultados de la investigación por favor póngase en contacto con Brenda Manak por correo electrónico a b-manak@tam.u.edu o Sarai Kuri por correo electrónico a skuri@celc-tat.com.mx.

### 1. ¿Cuál es su principal tipo de negocio?

- Empresa de transporte
- Proveedor de servicios de logística
- Empresa de fabricación
- Agente aduanal
- Importador

Otros (especifique)

### 2. ¿Usted o los controladores utilizan el puente de peaje en Zaragoza?

- Sí
- No

### 3. A su llegada en el puente de peaje de Zaragoza, ¿cuál es el promedio de tiempo de espera de frontera para cruzar a Estados Unidos?

- Menos de 1/2 hora
- 1/2 hora
- 1 Hora
- Más de 1 hora
- No espere
- No aplicable

### 4. ¿Usted o los controladores utilizan el puente de la Bota?

- Sí
- No

## Equesta de C-TPAT miembros incentivos para los miembros

**5. A su llegada en el puente de peaje de Bota, ¿cuál es el promedio de tiempo de espera de frontera para cruzar a Estados Unidos?**

- Menos de 1/2 hora
- 1/2 hora
- 1 hora
- Más de 1 hora
- No espere
- No aplicable

**6. ¿Si se cerró el puente de la Bota, sería más probable que utilice el puente de Zaragoza?**

- Sí
- No

**7. ¿Usted o los controladores utilizan el cruce fronterizo en Santa Teresa?**

- Sí
- No

**8. A su llegada en el cruce de frontera de Santa Teresa, ¿cuál es el tiempo promedio de espera de la frontera para cruzar a Estados Unidos?**

- Menos de 1/2 hora
- 1/2 hora
- 1 hora
- Más de 1 hora
- No espere
- No aplicable

## Encuesta de C-TPAT miembros incentivos para los miembros

### 9. ¿Quién determina la ruta de viaje para cruzar la frontera?

- Empresa de transporte
- Proveedor de servicios de logística
- Empresa de fabricación
- Agente aduanal
- Importador
- Controlador

Otros (especifique)

### 10. ¿Qué factores se consideran al elegir una ruta de cruce de frontera?

- Costo
- Seguridad
- Tiempo
- Tráfico

Otros (especifique)

### 11. ¿Cuál es la ruta de viaje y cruce de frontera determinado?

- Durante scheduling de entrega
- Inmediatamente antes de la salida
- Según lo determinado por el conductor

Otros (especifique)

## Encuesta de C-TPAT miembros incentivos para los miembros

### 12. ¿Ruta de viaje deben modificarse durante el tránsito, qué persona o entidad realiza la ruta cambia de decisión?

- Proveedor de servicios de logística
- Empresa de transporte
- Empresa de fabricación
- Agente aduanal
- Importador
- Controlador

Otros (especifique)

### 13. ¿Aproximadamente cuántos camiones los envíos de exportación es su conducta de la empresa por semana?

- 1-5
- 6-10
- 11-20
- 21-40
- Más de 40

### 14. Si usted es una empresa de fabricación, ¿su compañía utiliza almacenamiento o depósito antes de exportar los envíos?

- Sí
- No
- No aplicable

### 15. ¿Usted o su empresa tienen las certificaciones?

- Coalición para el comercio libre (CELC)
- Nuevo Esquema De Empresas Certificadas NEEC

Otros (especifique)

## Encuesta de C-TPAT miembros incentivos para los miembros

### 16. ¿Qué beneficios ha recibido a través de su membresía de C-TPAT?

- Mejorar el tiempo de cruce de frontera
- Aumento de la seguridad
- Menos inspecciones
- Mejora de la comercialización

Otro (especifique)

### 17. ¿Miembros de C-TPAT cumple con sus objetivos?

- Si
- No

Por favor explique

### 18. ¿El costo de incorporarse a C-TPAT igual o exceder sus beneficios de la membresía?

- Si
- No

### 19. ¿Existen beneficios adicionales le gustaría ver incluido en la membresía de C-TPAT?

- Si
- No

Haga una lista de recomendaciones

### 20. ¿Recomendarías miembros de C-TPAT a un miembro?

- Si
- No

¿Por qué o por qué no? (Por favor explique)

**C-TPAT Membership Incentives Survey for Non-Members**

**Thanks for taking our survey!**

The Texas A&M Transportation Institute in cooperation with the Coalition for Free Commerce (CELC) and the Border Trade Alliance (BTA) would like to thank you for taking your time to complete this survey.

Through this survey, we hope to determine your needs in order to recommend and initiate changes to improve your travel time, border wait time, and security.

If you would like to receive a copy of the survey results please contact Brenda Manak by email at [b-manak@tamu.edu](mailto:b-manak@tamu.edu) or Sarai Kuri by email at [skuri@celc-tat.com.mx](mailto:skuri@celc-tat.com.mx).

**Let's Begin!**

**1. What is your primary type of business?**

Trucking Company

Logistics Service Provider

Manufacturing Company

Customs Broker

Importer

Other (please specify)

**2. Do you or your drivers use the Toll Bridge at Zaragoza?**

Yes

No

**3. Upon arrival at the Zaragoza Toll Bridge, what is the average Border Wait Time to cross into the U.S.?**

Less than 1/2 Hour

1/2 Hour

1 Hour

More than 1 Hour

No Wait

Not Applicable

## C-TPAT Membership Incentives Survey for Non-Members

**4. Do you or your drivers use the Bota Bridge?**

- Yes  
 No

**5. Upon arrival at the Bota Bridge, what is the average Border Wait Time to cross into the U.S.?**

- Less than 1/2 Hour  
 1/2 Hour  
 1 Hour  
 More than 1 Hour  
 No Wait  
 Not Applicable

**6. If the Bota Bridge was closed, would you be more likely to use the Zaragoza Bridge?**

- Yes  
 No  
 Not Applicable

**7. Do you or your drivers use the Border Crossing at Santa Teresa?**

- Yes  
 No

**8. Upon arrival at the Santa Teresa Border Crossing, what is the average Border Wait Time to cross into the U.S.?**

- Less than 1/2 Hour  
 1/2 Hour  
 1 Hour  
 More than 1 Hour  
 No Wait  
 Not Applicable

## C-TPAT Membership Incentives Survey for Non-Members

### 9. Who determines the travel route when crossing the border?

- Trucking Company
- Logistics Service Provider
- Manufacturing Company
- Customs Broker
- Importer
- Driver

Other (please specify)

### 10. What factors are considered when choosing a border crossing route?

- Cost
- Security
- Time
- Traffic

Other (please specify)

### 11. When is the travel route and border crossing determined?

- During scheduling of delivery
- Immediately before departure
- As determined by driver

Other (please specify)

## C-TPAT Membership Incentives Survey for Non-Members

### 12. Should travel route need to be changed during transit, which person/entity makes the route change decision?

- Logistics Service Provider
- Trucking Company
- Manufacturing Company
- Customs Broker
- Importer
- Driver

Other (please specify)

### 13. Approximately how many truck export shipments does your company conduct per week?

- 1-5
- 6-10
- 11-20
- 21-40
- Over 40

### 14. If you are a manufacturing company, does your company use storage or warehousing prior to exporting shipments?

- Yes
- No
- Not Applicable

### 15. Which of the following certifications do you or your company hold?

- Coalition for Free Commerce (CELC)
- Nuevo Esquema De Empresas Certificadas (NEEC)

Other (please specify)

## C-TPAT Membership Incentives Survey for Non-Members

**16. Are you familiar with the requirements to join C-TPAT?**

- Yes  
 No

**17. Does your company have a certificate of incorporation?**

- Yes  
 No  
 Uncertain

**18. Does your company have any of the following Identification Numbers?**

- MID Number  
 DOT Number  
 Broker Serial Number  
 Broker Filer Number

Other (please specify)

**19. Are you familiar with the C-TPAT Supply Chain Security Guidelines?**

- Yes  
 No

**20. What benefits would you expect to receive by joining C-TPAT?**

- Improved Border Cross Time  
 Increased Security  
 Fewer Inspections  
 Improved Marketability

Other (please specify)

## C-TPAT Membership Incentives Survey for Non-Members

### 21. Why have you NOT join a Trusted Shipper Program?

- Initial Cost
- On-going Cost
- Not Enough Staff
- Takes Too Long

Other (please specify)

We sincerely appreciate your completion of this survey. Thank you!

## Spanish Version of C-TPAT Non-Member Survey

### Encuesta de C-TPAT miembros incentivos para los no miembros

La Texas A & M transportes Instituto en cooperación con la coalición de libre comercio (CELC) y la Alianza de comercio fronterizo (TBA) quisiera darle las gracias por tomar su tiempo para llenar esta encuesta.

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#### 1. ¿Cuál es su principal tipo de negocio?

- Empresa de transporte
- Proveedor de servicios de logística
- Empresa de fabricación
- Agente aduanal
- Importador

Otros (especifique)

#### 2. ¿Usted o los controladores utilizan el puente de peaje en Zaragoza?

- Si
- No

#### 3. A su llegada en el puente de peaje de Zaragoza, ¿cuál es el promedio de tiempo de espera de frontera para cruzar a Estados Unidos?

- Menos de 1/2 hora
- 1/2 hora
- 1 Hora
- Más de 1 hora
- No espere
- No aplicable

#### 4. ¿Usted o los controladores utilizan el puente de la Bota?

- Si
- No

## Encuesta de C-TPAT miembros incentivos para los no miembros

**5. A su llegada en el puente de peaje de Bota, ¿cuál es el promedio de tiempo de espera de frontera para cruzar a Estados Unidos?**

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- Más de 1 hora
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**6. ¿Si se cerró el puente de la Bota, sería más probable que utilice el puente de Zaragoza?**

- Sí
- No

**7. ¿Usted o los controladores utilizan el cruce fronterizo en Santa Teresa?**

- Sí
- No

**8. A su llegada en el cruce de frontera de Santa Teresa, ¿cuál es el tiempo promedio de espera de la frontera para cruzar a Estados Unidos?**

- Menos de 1/2 hora
- 1/2 hora
- 1 hora
- Más de 1 hora
- No espere
- No aplicable

## Encuesta de C-TPAT miembros incentivos para los no miembros

### 9. ¿Quién determina la ruta de viaje para cruzar la frontera?

- Empresa de transporte
- Proveedor de servicios de logística
- Empresa de fabricación
- Agentes aduanal
- Importador
- Controlador

Otros (especifique)

### 10. ¿Qué factores se consideran al elegir una ruta de cruce de frontera?

- Costo
- Seguridad
- Tiempo
- Tráfico

Otros (especifique)

### 11. ¿Cuál es la ruta de viaje y cruce de frontera determinado?

- Durante scheduling de entrega
- Inmediatamente antes de la salida
- Según lo determinado por el conductor

Otros (especifique)

**Encuesta de C-TPAT miembros incentivos para los no miembros**

**12. ¿Ruta de viaje deben modificarse durante el tránsito, qué persona o entidad realiza la ruta cambia de decisión?**

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- Controlador

Otros (especifique)

**13. ¿Aproximadamente cuántos camiones los envíos de exportación es su conducta de la empresa por semana?**

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**15. ¿Usted o su empresa tienen las certificaciones?**

- Coalición para el comercio libre (CELC)
- Nuevo Esquema De Empresas Certificadas NEEC

Otros (especifique)

## Encuesta de C-TPAT miembros incentivos para los no miembros

### 16. ¿Está usted familiarizado con los requerimientos para incorporarse a C-TPAT?

- Sí  
 No

### 17. ¿Su empresa tiene un certificado de incorporación?

- Sí  
 No  
 No estoy seguro

### 18. ¿Su empresa tiene cualquiera de los siguientes números de identificación?

- Número medio  
 Número del punto  
 Número de serie de Broker  
 Número de agente Filer

Otros (especifique)

### 19. ¿Está usted familiarizado con las normas de seguridad de la cadena de suministro de C-TPAT?

- Sí  
 No

### 20. ¿Qué beneficios serían su espera recibir uniéndose a C-TPAT?

- Frontera mejor cruzar el tiempo  
 Aumento de la seguridad  
 Menos inspecciones  
 Mejora de la comercialización

Otros (especifique)

**Encuesta de C-TPAT miembros incentivos para los no miembros**

**21. ¿Por qué usted no ha adherido un programa cargador de confianza?**

- Costo inicial
- Coste en curso
- No hay suficiente personal
- Tarda demasiado

Otros (especifique)