



Carrier FLEET Model Short Version

(For Carriers with 20 or Fewer Trucks)

EPA's SmartWaySM Transport Partnership is a voluntary program that recognizes Partners for setting and achieving greenhouse gas (GHG) reduction goals in freight transport.

Becoming a SmartWay Transport Carrier Makes Good Business Sense

- **Cost Savings:**

The Partnership promotes new technologies and management practices to save fuel, which saves you money, period.

- **Business-to-Business Advantage:**

SmartWay Transport Carriers are preferred by SmartWay Transport Shippers, and they want to ship their goods with you. Shipper Partners are already giving priority contracts to SmartWay Transport Carriers.

- **Technical Support:**

EPA will assist you in developing and meeting your goals.

- **Recognition for Your Existing Environmental Improvements:**

Your fleet's existing fuel efficiency strategies, coupled with continued improvements, determine your status in the Partnership. You get full credit for improvements made thus far.

- **Promotional opportunities and public recognition:**

The SmartWay Transport Partner brand of excellence is awarded to qualifying Partners as a visible cue to your business customers, clients, and consumers to use in their advertising and other promotional media. It tells them that you are a champion of environmental stewardship and helps them to make educated choices about SmartWay Transport(ed) products. Visible exposure through national and regional events, advertisements, articles, and special recognition are just a few ways that EPA commits to recognize your achievements.

Becoming a Partner is Easy

Simply complete the information on page 2 and 4; and, mail, fax, or email this form/spreadsheet to

SmartWay Transport Partnership
U.S. EPA Office of Transportation and Air Quality
2000 Traverwood
Ann Arbor, MI 48105
Fax: (734) 214-4052
Email: smartway_transport@epa.gov

For more information about joining the SmartWay Transport Partnership or for other assistance, call us at (734) 214-4767.



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Partnership Agreement

	Column C	Column F	Column I
66	Company:		
67	Contact:		
68	Address:		
69	City:	State:	ZIP:
70	Phone:	FAX:	
71	SCAC:	E-Mail:	

EPA's SmartWay Transport Partnership is a voluntary program that recognizes Partners for setting and achieving greenhouse gas (GHG) reduction goals in freight transport.

With this agreement, the company named above, joins EPA's SmartWay Transport Partnership and commits to:
 Measure its environmental performance by completing the Short Version of the Freight Logistics Environmental and Energy Tracking (FLEET) performance model (page 4) of emission/fuel savings practices and technologies installed and/or used on tractors.
 Improve its Point Total score by at least 15% per year for three years.
 Report annually progress toward achieving performance by resubmitting Short Version of FLEET performance model each year.

In return, EPA commits to:
 Increase public awareness of Partner participation in the SmartWay Transport Partnership by listing Partners on the EPA SmartWay Transport Partnership web site and in related educational, promotional and media materials.
 Obtain express written consent from a Partner before publishing the Partner's name in any context or for any purpose other than those stipulated above.
 Publicize the actual performance data of Partners only with a Partner's express permission, except as otherwise required by law.
 Assist Partners in achieving goals, by working to address challenges, create incentives, and provide technical assistance and support (subject to appropriations).

General terms:
 If the Partner or EPA defaults upon this agreement at any point, the agreement shall be considered null and void. Either party can terminate the agreement at any time without prior notification or penalties or any further obligation. EPA agrees not to comment publicly regarding the withdrawal of Partners.
 EPA reserves the right to suspend or revoke Partner status for any Partner that fails to accomplish the specific actions to which it committed in the SmartWay Transport Partnership Agreement and subsequent Agreements.
 The Partner agrees that it will not claim or imply that its participation in the SmartWay Transport Partnership constitutes EPA approval or endorsement of anything other than the Partner's commitment to the program. The Partner will not make statements or imply that EPA endorses the purchase or sale of the Partner's products and services or the views of the organization.
 The Partner understands that it bears its own costs for participation in this program, and agrees not to submit a claim for compensation to EPA or any other Federal agency on the basis of this agreement.

Authorized Partner Official:
 The undersigned understands and agrees to the terms of the EPA SmartWay Transport Partnership. Entering data below and then submitting to the EPA via Email, will constitute a "signature" for the purpose of this document.

104	Signature:	Title:
106	Print Name:	Date:

Return page 2 and 4 to:
 EPA SmartWay Transport Partnership
 2000 Traverwood
 Ann Arbor, MI 48105
 Or, Fax to 734-214-4906 Or, Email to Smartway_transport@epa.gov
 For additional information about the SmartWay Program, access the SmartWay website at www.epa.gov/smartway/

Frequently Asked Questions

1. *How do I fill out the FLEET Model form on page 4?*

- o Owner/ Operator (1 truck)
Enter a 1 in ColumnB on lines that describe your truck (ColumnC)
- o Small Fleets (2 to 20 trucks)
Enter number of trucks in ColumnB that have the characteristics described in ColumnC

The calculation for Column I is as follows:

$$\frac{\# \text{ Trucks from ColumnB}}{\text{Total Number of Trucks from Line 186}} \text{ times ColumnH}$$

The Shipper Index Factor (SIF) is based upon the total of ColumnH, using the table at the bottom of the form.

2. *How does my SmartWay Shipper Index Factor (SIF) compare to other truck operators' scores?*

The SmartWay SIF scores are grouped into three categories. The average performance of current SmartWay carrier Partners who have completed a FLEET model is shown in the table below:

<u>SIF Score</u>	<u>% of Total</u>	<u>Performance</u>
0.75	60	• Good environmental performance
1.00	15	• Very good environmental performance
1.25	25	• Outstanding environmental performance

3. *Why should I improve my SIF score?*

A higher SmartWay score shows better fuel efficiency. Fuel typically accounts for 20-25 % of the cost of operating a truck. Any fuel that is saved results in reduced costs. At the same time, using less fuel lowers greenhouse gas emissions and air pollution.

4. *How do I improve my SIF score?*

Each SmartWay Partner is expected to improve its score over time. The most effective steps a trucker can take to improve fuel efficiency are:

- **Reduced idling.** A typical long-haul combination truck can save up to 1900 gallons of fuel each year by using auxiliary power units, automatic engine idle systems and truck stop electrification.
- **Lower speed.** Reducing highway speed by 5 mph can cut fuel use and greenhouse gas emissions by over 7%.
- **Better aerodynamics.** Aerodynamic drag (wind resistance) accounts for most truck energy losses at highway speeds. Reducing drag improves fuel efficiency. For example, cutting drag by 25% can improve fuel efficiency by up to 15%. Methods include use of fairings as well as cab extenders to minimize the gap between tractor and trailer.
- **Tires.** Specifying single wide-base tires on a new combination truck could result in fuel savings of 2% or more. Automatic tire inflation systems can save tire maintenance costs and improve fuel economy by 1%.
- **Low-friction lubricants.** Synthetic engine and drive train lubricants can improve fuel economy by about 3%.
- **Driver training.** Even highly experienced truck drivers can boost their skills and enhance driving performance through driver training programs. A few simple changes in driving techniques (e.g. cruise control, block-shift, progressive shift) can produce sizable fuel savings of 5% or more.

5. *How do I track my progress?*

By completing the Short Form in this application, a trucker establishes a performance baseline that can be used for later comparison. After each year, a SmartWay trucker is expected to complete and submit an updated Short Form. These annual updates allow progress to be tracked.

6. *What does the "Emissions Tons Saved per Year" mean?*

Based upon how many trucks you have and which attributes you select, you can calculate how much emissions you are saving each year as compared to a non-aerodynamic baseline truck that idles 8 hours per day. For example, if you have one truck and are idling less than 300 hours per year, you are not emitting 16 tons of CO₂ (Carbon Dioxide) and .288 tons of Particulate Matter and Nitrous Oxide gas per year.



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185	Company:			
186	Total Number of Trucks:		Total Miles Driven per Year:	
187	Total Gallons Fuel Used per Year:		MPG:	

Instructions: ColumnB enter # Trucks that have the attributes listed in ColumnC
 ColumnI equals ColumnB divided by Total Number of Trucks multiplied by ColumnH
 ColumnF-CO2 equals ColumnB multiplied by ColumnD-CO2
 ColumnG-PM/NOX equals ColumnB multiplied by ColumnE-PM/NOX

194	ColumnB	ColumnC	ColumnD	ColumnE	ColumnF	Column G	ColumnH	ColumnI	
195		EMISSION BONUS POINTS					5.10		
196		Particulate Trap Installed (pre-2004)					4.00		
197		Oxidation Catalyst Installed (pre-2004)					1.00		
198		ECM Reflashed (1994 - 1998 only trucks)					0.10		
199		Emission Tons Saved per Year							
200		ENGINE IDLING - HRS PER YR	CO2	PM/NOX	CO2**	PM/NOX***	1.45		
201		300 Hours or less	16	0.288			1.45		
202		301 hours to 599 hours	13	0.236			1.21		
203		600 hours to 899 hours	11	0.195			0.96		
204		900 hours to 1199 hours	8	0.144			0.71		
205		1200 hours to 1500 hours	5	0.092			0.47		
206		AERODYNAMICS					3.28		
207		Aero Profile Tractor	8				0.68		
208		Cab Over Engine	11				0.96		
209		Integrated Cab Roof Fairing	11				0.96		
210		Cab Roof Fairing Add-on	8				0.76		
211		Cab Roof Deflector	6				0.56		
212		Cab Side Fairing	2				0.18		
213		Cab Front Air Dam Bumper	2				0.18		
214		Cab Aerodynamic Mirrors	1				0.05		
215		Trailer Gap Less Than 44"	3				0.28		
216		TIRES					0.67		
217		Single-Wide	6				0.56		
218		Auto Inflation System	1				0.11		
219		LOW FRICTION LUBRICANTS					0.56		
220		Synth Engine Lubricants	3				0.28		
221		Synth DriveTrain Lubricants	3				0.28		
222		AVERAGE SPEED					3.21		
223		Below 55 & Above 45	36				3.21		
224		57	30				2.72		
225		59	25				2.25		
226		61	20				1.80		
227		63	15				1.37		
228		65	11				0.96		
229		Above 65 & Less Than 70	5				0.50		
230		Emission Tons Saved Totals						Point Total	
231		Column I Line 230 Point Total	SIF						
232		0 - 3.99 =	0.75						
233		4.00 - 4.94 =	1.00						
234		4.95+ =	1.25	Shipper Index Factor (SIF)					
235									
236		Signature					Date		

Cell: C66

Comment: Company:
Enter official company name

Cell: C67

Comment: Contact:
Enter name of SmartWay contact

Cell: C68

Comment: Address:
Enter company address

Cell: C69

Comment: City:
Enter company state

Cell: F69

Comment: State:
Enter company state

Cell: I69

Comment: ZIP:
Enter company ZIP code

Cell: C70

Comment: Phone:
Enter SmartWay Contact phone number

Cell: F70

Comment: FAX:
Enter FAX number of SmartWay contact

Cell: C71

Comment: SCAC:
Enter Standard Carrier Alpha Code (SCAC) if known. The Standard Carrier Alpha Code (SCAC) is a unique two-to-four-letter code used to identify transportation companies. NMFTA assigns SCACs for all companies except those codes used for identification of freight containers not operating exclusively in North America, intermodal chassis and trailers, non-railroad owned rail cars, and railroads. To apply online go to <https://secure.nmfta.org/scacapp.htm>

Cell: F71

Comment: E-Mail:
Enter Email address of SmartWay contact

Cell: C104

Comment: Signature:

Cell: G104

Comment: Title:

Cell: C106

Comment: Print Name:

Cell: G106

Comment: Date:

Cell: D186

Comment: Total Number of Trucks:
Enter Number of Trucks between 1 and 20

Cell: I186

Comment: Total Miles Driven per Year:

Cell: D187

Comment: Total Gallons Fuel Used per Year:

Cell: I187

Comment: MPG is calculated:
Total Miles Driven per Year divided by Total Gallons Fuel Used per Year

Cell: B194

Comment: In Column B :
Enter number of trucks that have attributes listed in Column C

Cell: H194

Comment: ColumnH represents annual fuel savings in gallons divided by 1000 for 1 truck

Cell: I194

Comment: ColumnI is calculated:
ColumnB divided by CellD186(Total Number of Trucks) times ColumnH

Cell: C196

Comment: Diesel Particulate Filter: A Diesel Particulate Filter, sometimes called a DPF, is a device designed to remove diesel particulate matter or soot from the exhaust gas of a diesel engine, most of which are rated at 85% efficiency, but often attaining efficiencies of over 90%. A diesel-powered vehicle with a filter installed will emit no visible smoke from its exhaust pipe.

Cell: C197

Comment: Oxidation Catalyst: The diesel oxidation catalyst (DOC) is effective for the control of carbon monoxide (CO), hydrocarbons (HC), odor causing compounds, and the soluble organic fraction (SOF) of particulate matter (PM10).

Cell: D199

Comment: Emission Tons Saved per Year is based upon an average engine idle time of 1920 hours per year

Cell: B200

Comment: If 1 Truck, choose 1 of lines 201, 202, 203, 204, 205

Cell: C200

Comment: For 1 Truck:
Pick one
For 1+ trucks:
Pick all that apply

Cell: D200

Comment: Carbon dioxide is a chemical compound composed of one carbon and two oxygen atoms. It is present in the Earth's atmosphere at a low concentration and acts as a greenhouse gas.

Cell: E200

Comment: Particulates, alternatively referred to as particulate matter (PM), aerosols or fine particles, are tiny particles of solid (a smoke) or liquid (an aerosol) suspended in a gas.
NOx is a generic term for the various nitrogen oxides produced during combustion. They are believed to aggravate asthmatic conditions, react with the oxygen in the air to produce ozone, which is also an irritant and eventually form nitric acid when dissolved in water.

Cell: F200

Comment: CO2 is calculated:
ColumnB Number of Trucks times ColumnD CO2 tons saved

Cell: G200

Comment: PM/NOX is calculated:
Column B Number of Trucks times Column E PM/NOX Tons saved per year

Cell: C206

Comment: Choose all that apply:

Cell: B209

Comment: If 1 Truck, choose 1 of lines 209, 210, or 211.

Cell: B210

Comment: If 1 Truck, choose 1 of lines 209, 210, or 211.

Cell: B211

Comment: If 1 Truck, choose 1 of lines 209, 210, or 211.

Cell: C216

Comment: Choose all that apply:

Cell: C219

Comment: Choose all that apply:

Cell: B222

Comment: If 1 truck, enter 1 of line 223, 224, 225, 226, 227, 228, or 229.

Cell: C222

Comment: For 1 Truck:
Pick one
For 1+ trucks:
Pick all that apply
CO2 savings are compared to an average speed of 70 MPH

Cell: F230

Comment: Emission Tons Saved Totals C02:
Calculated - Sum of F201 thru F229

Cell: G230

Comment: Emission Tons Saved Totals - PM/NOX:
Calculated - sum of G201 thru G205

Cell: I230

Comment: Point Total:
Calculated - sum of I201 thru I 229

Cell: D231

Comment: SIF: Shipper Index Factor. A number used by SmartWay Shipper partners to assess the fuel and emissions efficiency of their carriers. Score is posted on SmartWay web site.

Cell: I234

Comment: Shipper Index Factor is derived from Table on the left.