

LARGE IC CUSHION  
**BOX CAR SPECIAL**

**TOYOTA**  
INDUSTRIAL EQUIPMENT  
REACH NEW HEIGHTS

# THINK INSIDE THE BOX

- ▶ 8000 - 12000 lb. Capacity
- ▶ Mast Height Under 90 in.
- ▶ Vertically Extended Counterweight
- ▶ 20% More Fuel Efficient



8FGC35U-55U-BCS

CLASS  
**4**

INTERNAL COMBUSTION ENGINE CUSHION TIRE

[ToyotaForklift.com](http://ToyotaForklift.com)

# BIG ON SMALL SPACE PRODUCTIVITY

**THE TOYOTA BOX CAR SPECIAL FORKLIFT.** A high lift capacity forklift that can comfortably squeeze into railcars and other tight spaces? It's a major small miracle. One made possible by a vertically extended counterweight that frees the Box Car Special to work in confined areas without sacrificing lifting power. It's a design that opens up new opportunities in racking, space planning and shipping. So you can think big and small, at the same time.

## BOX CAR SPECIAL ADVANTAGES

- ▶ **VERTICALLY EXTENDED COUNTERWEIGHT**  
for superior tight space navigability
- ▶ **MAST HEIGHT** under 90 inches for clearance to work in railcars
- ▶ **ACTIVE MAST CONTROL** responds automatically to enhance stability of loads handled at high lift heights
- ▶ **SYSTEM OF ACTIVE STABILITY™ (SAS)** acts automatically in uncertain situations to protect operator, and reduce product and forklift damage
- ▶ **REAR ASSIST GRIP** makes reverse travel more comfortable, improves peripheral vision and keeps operator's hands safely within the compartment
- ▶ **INDEPENDENT BRAKE & INCHING CONTROL PEDALS**  
for excellent stopping power and precise positioning of forklift





# UNDER 90<sup>IN.</sup>

MAST HEIGHT

- ▶ **STANDARD 4-WAY ADJUSTABLE FULL-SUSPENSION SEAT** is wider with no hip restraints for easier entry/exit than competitors' seats; weight-adjustable for greater operator comfort
- ▶ **IMPROVED ERGONOMICS** including dash-mounted instrument display, load-sensing power steering, 11.8 inch steering wheel, dash-integrated amenity tray and oversized cup holder
- ▶ **LOAD-SENSING POWER STEERING** for smooth, responsive operation with little vibration and shock, helping to reduce operator fatigue
- ▶ **DURABLE BOLT-ON OVERHEAD GUARD** provides maximum operator protection with improved entry/exit and load visibility
- ▶ **ENGINE PROTECTION SYSTEM** automatically reduces power if coolant temperature rises to potentially damaging levels
- ▶ **FULLY SEALED AIR INTAKE** is mounted up high to limit low-level dust and debris from entering engine

## BOX CAR SPECIAL

### CAPACITY

**8000 - 12000 LBS.**

### WHEELBASE

**61.8 - 70.5 IN.**

### LOAD CENTER

**24 IN.**

### INDUSTRIES



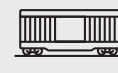
General  
Manufacturing



General  
Warehousing



Intermodal/Port



Rail Yard



Retail

## STANDARD FEATURES

### DURABILITY

- Control Area Network (CAN-bus) communication
- Fully stamped steel side panels
- Full-floating front axle
- Moisture-resistant electric connectors
- High cooling capacity radiator
- Low-maintenance battery
- Large-capacity engine cooling fan
- 8" cyclone air cleaner
- Plate-iron front fenders
- Anti-restart ignition key switch
- Stamped steel engine hood
- Radiator screen
- External hydraulic oil cooler

### SAFETY

- System of Active Stability™ (SAS)
- Operator Presence Sensing System (OPSS)
- Bolt-on overhead guard
- Key lowering interlock
- Electric horn
- Neutral start safety switch
- Conventional headlights
- Orange forks

### PERFORMANCE

- EPA/CARB-certified engine
- Toyota 3.7 liter, 4-cylinder, OHV gasoline engine (1FS)
- Electronic fuel injection
- Distributorless ignition system
- UL-approved model type "LP"
- Automatic fork leveling
- Full-floating powertrain
- Limited free-lift 2-stage mast (V)
- Hydraulic valve lifters
- Integrated monitoring system – includes:
  - Digital hour meter display
  - Engine coolant temperature gauge
  - Check engine light
  - Engine oil pressure warning light
  - Battery charge warning light
  - OPSS activation light
- Adjustable headlights with guards
- Double action parking brake (hand)
- Alternator with built-in regulator (GOA)
- Automatic transmission with oil cooler
- Load-sensing power steering
- Integrated headlight & turn signal lever
- Electric shift control
- Speed control
- Engine protection system

### ERGONOMICS

- Dash-mounted instrument display
- 11.8"-dia., 2-spoke steering wheel
- Load-sensing power steering
- Cowl-mounted hydraulic control levers with rubber boot covers
- 12"-long dual operator assist grips
- Low, wide entry steps
- Vinyl 4-way adjustable full-suspension seat
- Dash-integrated amenity tray & oversized cup holder
- Non-cinching seatbelt

### SERVICEABILITY

- Easy access no tools required floorboard
- Engine hood assist damper with lock device
- Air cleaner discharge valve
- Easy-lift engine hood with wide 75° opening
- Easy access to common service items such as filters & dipsticks

## OPTIONAL EQUIPMENT

### LOAD HANDLING

- Various fork bar (carriage) widths
- Fully tapered & polished forks
- High-load backrest
- Hydraulic accumulator
- Hydraulic quick disconnects (dual)
- Hydraulic valve for clamping attachments
- Less backrest
- Less forks
- Side hosing termination
- Tapered forks
- Tilt cylinder boots

### LOAD HANDLING (HOSE & VALVE ASSEMBLY)

- 3-way valve (with 3rd function hosing)
- 4-way valve (with 3rd & 4th function hosing or no hosing)
- 5-way valve (with 3rd, 4th & 5th function hosing)

*Optional Equipment, continued*

**LOAD HANDLING (ATTACHMENT & OTHER LOAD HANDLING OPTIONS)**

- Cascade component guard (hang-on sideshifter)
- Clamp release interlock system

**POWERTRAIN**

- Box fin radiator
- Cyclone air cleaner (dual element)
- High-capacity alternator
- High-capacity cooling package
- Keyless ignition switch
- Low LPG fuel warning indicator
- LPG bracket (swing-down type)
- LPG regulator drain valve
- High-capacity battery
- Pre-cleaner
- Sealed alternator
- Sealed starter

**BODY**

- Block heater
- Engine hood ventilation
- Polycarbonate OHG cover
- Rearview mirrors (left & right side)
- Special paint

**LIGHTS**

- Front combination lights
- Rear combination lights
- Strobe light

**LED LIGHTS**

- LED front combination lights
- LED headlights
- LED rear combination lights
- LED rear work light
- LED reverse activated rear work light
- LED strobe light

**LIGHTING—OTHER**

- Auto lights-off (wired to oil pressure switch)
- Key off headlight system
- Operator compartment light
- Wiring harness for rear overhead guard options

**STEERING & OPERATION**

- Directional lever on column
- EZ pedal (foot directional control)
- Intelli-Shift
- Mini-lever controls with ErgoShift
- Single pedal (combination brake/inching)
- Steering wheel with knob
- Synchronized steering

**SEAT & SEAT BELTS**

- Cloth 4-way adjustable full-suspension seat
- Swivel seat
- Orange seatbelt

**INDICATORS & MISCELLANEOUS**

- 12-Volt power supply
- Adjustable volume back up alarm (smart alarm)
- Fire extinguisher
- Multifunction digital display with self-diagnostics
- OK monitor
- Operator cooling fan
- Pencil/tape holder (mounted on OHG leg)
- Pre-delivery inspection
- Rear pillar assist grip with horn button

**TELEMATICS**

- T-matics mobile
- T-matics COMMAND

**CHASSIS**

- Wide tread tires
- Treaded, non-marking tires (front & rear)
- Smooth back tires (front & rear)
- Smooth, non-marking tires (front & rear)

# TRUCK SPECIFICATIONS

## MODEL NUMBERS

GENERAL DATA				8FGC35U-BCS	8FGC45U-BCS	8FGC55U-BCS
Load Capacity	lb (kg)			8000 (3500)	10000 (4500)	12000 (5500)
Load Center	in (mm)			24 (600)	24 (600)	24 (600)
Power Type				LPG	LPG	LPG
Operator Position				Seated Rider	Seated Rider	Seated Rider
Tire Type	Front / Rear			Cushion / Cushion	Cushion / Cushion	Cushion / Cushion
Wheels (x = driven)	Front / Rear			2x / 2	2x / 2	2x / 2
EXTERIOR DIMENSIONS				8FGC35U-BCS	8FGC45U-BCS	8FGC55U-BCS
Maximum Fork Height (top of forks)	in (mm)			120 (3050)	120 (3050)	120.5 (3060)
Free-Lift (top of forks)	in (mm)			4.3 (110)	4.3 (110)	4.7 (120)
Fork Size (T x W x L)	in (mm)			2 x 6 x 42 (50 x 150 x 1070)	2 x 6 x 42 (50 x 150 x 1070)	2.4 x 6 x 48 (60 x 150 x 1220)
Fork Spread Max. / Min. (outer edge to edge)	in (mm)			45.7 / 11.8 (1160 / 300)	45.7 / 11.8 (1160 / 300)	46.1 / 11.8 (1170 / 300)
Tilt Range (forward / backward)	deg			5 / 6	5 / 6	5 / 6
Length to Fork Face	in (mm)			95.5 (2425)	100.2 (2545)	106.3 (2700)
Overall Width	in (mm)			50 (1270)	55.9 (1420)	55.9 (1420)
Mast Lowered Height	in (mm)			81.1 (2060)	83 (2110)	86.6 (2200)
Mast Extended Height (top of load backrest)	in (mm)			168.1 (4270)	168.1 (4270)	174.6 (4435)
Overhead Guard Height	in (mm)			83.5 (2120)	83.5 (2120)	83.5 (2120)
Turning Radius (outside)	in (mm)			82 (2090)	88 (2230)	93.5 (2380)
Load Distance <sup>1</sup>	in (mm)			17.7 (450)	18.1 (460)	18.5 (470)
Basic Right-Angle Stacking Aisle Width <sup>2</sup>	in (mm)			100 (2540)	106 (2690)	112 (2850)
PERFORMANCE DATA				8FGC35U-BCS	8FGC45U-BCS	8FGC55U-BCS
Speeds	Maximum Travel (forward / reverse)	Full Load	mph (km/h)	11.8 (19.0) / 11.8 (19.0)	11.8 (19.0) / 11.8 (19.0)	13.0 (21.0) / 13.0 (21.0)
		No Load	mph (km/h)	11.8 (19.0) / 11.8 (19.0)	11.8 (19.0) / 11.8 (19.0)	13.0 (21.0) / 13.0 (21.0)
	Lifting	Full Load	fpm (mm/sec)	100 (510)	98 (500)	91 (460)
		No Load	fpm (mm/sec)	108 (550)	100 (510)	94 (480)
	Lowering	Full Load	fpm (mm/sec)	104 (530)	106 (540)	106 (540)
		No Load	fpm (mm/sec)	94 (480)	96 (490)	96 (490)
Drawbar Pull	Maximum	Full Load	lb (kg)	9900 (4500)	9900 (4500)	9900 (4500)
		No Load	lb (kg)	2780 (1260)	2670 (1210)	3390 (1540)
Gradeability <sup>3</sup>	1 mph (1.5 km/h)	Full Load	%	37	30	25
		Full Load	%	47	37	34
	Maximum	Full Load	%	47	37	34
		No Load	%	19	16	19
TRUCK WEIGHTS				8FGC35U-BCS	8FGC45U-BCS	8FGC55U-BCS
Total Weight	lb (kg)			12810 (5810)	14900 (6760)	16320 (7400)
Weight Distribution	Full Load (front / rear)	lb (kg)		18320 (8070) / 2490 (1240)	21580 (9700) / 3320 (1560)	25160 (11480) / 3160 (1420)
	No Load (front / rear)	lb (kg)		4920 (2230) / 7890 (3580)	4780 (2170) / 10120 (4590)	5930 (2690) / 10390 (4710)
TIRES				8FGC35U-BCS	8FGC45U-BCS	8FGC55U-BCS
Tires	Number (front / rear)			2 / 2	2 / 2	2 / 2
	Size	Front		22 x 9 x 16	22 x 12 x 16	22 x 12 x 16
Rear			18 x 6 x 12-1/8	18 x 7 x 12-1/8	18 x 8 x 12-1/8	
Wheelbase	in (mm)			61.8 (1570)	61.8 (1570)	70.5 (1790)
Tread Width (front / rear)	in (mm)			40.9 (1040) / 41.4 (1050)	43.9 (1115) / 42.4 (1080)	43.9 (1115) / 43.5 (1105)
Underclearance (full load)	Minimum with Load		in (mm)	3.3 (85)	3.3 (85)	3.3 (85)
	Center of Wheelbase		in (mm)	5.7 (145)	5.7 (145)	5.7 (145)
Brake	Service (foot) / Parking			Hydraulic / Hand	Hydraulic / Hand	Hydraulic / Hand
POWER SYSTEM				8FGC35U-BCS	8FGC45U-BCS	8FGC55U-BCS
Battery (5-hour rating)	V / Ah			12 / 48	12 / 48	12 / 48
Internal Combustion Engine	Make / Model			TOYOTA 1FS	TOYOTA 1FS	TOYOTA 1FS
	Rated Horsepower @ rpm	SAE HP		84 @ 2350	84 @ 2350	89 @ 2550
		(kW)		(63 @ 2350)	(63 @ 2350)	(66 @ 2550)
	Rated Torque @ rpm	SAE ft-lb		210 @ 1200 - 1400	210 @ 1200 - 1400	210 @ 1200 - 1400
		(N-m)		(290 @ 1200 - 1400)	(290 @ 1200 - 1400)	(290 @ 1200 - 1400)
	Number of Cylinders			4	4	4
	Piston Displacement		cu in (cc)	224 (3685)	224 (3685)	224 (3685)
Fuel Tank Capacity		US gal (liter)	—	—	—	
Transmission	Type			Automatic	Automatic	Automatic
	Speeds (forward / reverse)			1 / 1	1 / 1	1 / 1
Auxiliary Hydraulic Function Specifications (for attachments) <sup>4</sup>	Max. Operating Pressure	psi (kg/cm <sup>2</sup> )		2630 (185)	2630 (185)	2630 (185)
	Max. Flow Rate	gpm (lpm)		33.8 (128)	33.8 (128)	33.8 (128)

1 At centerline of front axle to front face of forks.  
 2 Add load length & clearance.  
 3 Computed values. Performance of LPG fuel system may be less than performance of standard model shown.  
 4 Values taken at Hydraulic Control Valve. Does not take in to consideration losses through mast plumbing (hosing, fittings, QDs, etc.).

# MAST SPECIFICATIONS

MAST TYPE	MAXIMUM FORK HEIGHT (TOP OF FORKS)	OVERALL HEIGHT			FREE-LIFT		TILT RANGE		LOAD CAPACITY AT 24 IN. (610 MM) LOAD CENTER	
		LOWERED	EXTENDED		WITHOUT LOAD BACKREST	WITH STANDARD LOAD BACKREST	FWD	BWD	STANDARD TREAD	WIDE TREAD
			WITHOUT LOAD BACKREST	WITH STANDARD LOAD BACKREST <sup>1</sup>						
in (mm)	in (mm)	in (mm)	in (mm)	in (mm)	in (mm)	deg	deg	lb (kg)	lb (kg)	
<b>8FGC35U-BCS</b>										
Wide Visible (V)	120 (3050)	81.1 (2060)	149.6 (3800)	168.1 (4270)	4.3 (110)	4.3 (110)	5	6	8000 (3500)	8000 (3500)
	132 (3350)	88.2 (2240)	161.4 (4100)	179.9 (4570)	4.3 (110)	4.3 (110)	5	6	8000 (3500)	8000 (3500)
	147.5 (3750)	96.1 (2440)	177.2 (4500)	195.7 (4970)	4.3 (110)	4.3 (110)	5	6	8000 (3500)	8000 (3500)
Full Free-Lift 2-Stage (FV)	120 (3050)	81.1 (2060)	150.8 (3830)	168.1 (4270)	50.4 (1280)	33.1 (840)	5	6	8000 (3500)	8000 (3500)
	132 (3350)	88.2 (2240)	162.6 (4130)	179.9 (4570)	57.5 (1460)	40.2 (1020)	5	6	8000 (3500)	8000 (3500)
Full Free-Lift 3-Stage (FSV)	159.5 (4050)	81.1 (2060)	190.9 (4850)	207.5 (5270)	49.6 (1260)	33.1 (840)	5	5	8000 (3500)	8000 (3500)
	171.5 (4350)	83.1 (2110)	202.8 (5150)	219.3 (5570)	51.6 (1310)	35.0 (890)	5	5	7870 (3500)	7870 (3500)
	187 (4750)	88.2 (2240)	218.5 (5550)	235.0 (5970)	56.7 (1440)	40.2 (1020)	5	5	7700 (3500)	7700 (3500)
	199 (5050)	92.1 (2340)	230.3 (5850)	246.9 (6270)	60.6 (1540)	44.1 (1120)	5	5	7550 (3450)	7550 (3450)
	218.5 (5550)	98.0 (2490)	250.0 (6350)	266.5 (6770)	66.5 (1690)	50.0 (1270)	5	5	7340 (3350)	7340 (3350)
238 (6050) <sup>2</sup>	105.9 (2690)	269.7 (6850)	286.2 (7270)	74.4 (1890)	57.9 (1470)	5	5	N/A	6500 (2950)	

MAST TYPE	MAXIMUM FORK HEIGHT (TOP OF FORKS)	OVERALL HEIGHT			FREE-LIFT		TILT RANGE		LOAD CAPACITY AT 24 IN. (610 MM) LOAD CENTER	
		LOWERED	EXTENDED		WITHOUT LOAD BACKREST	WITH STANDARD LOAD BACKREST	FWD	BWD	STANDARD TREAD	lb (kg)
			WITHOUT LOAD BACKREST	WITH STANDARD LOAD BACKREST <sup>1</sup>						
in (mm)	in (mm)	in (mm)	in (mm)	in (mm)	in (mm)	deg	deg	lb (kg)	lb (kg)	
<b>8FGC45U-BCS</b>										
Wide Visible (V)	120 (3050)	83.1 (2110)	152.0 (3860)	168.1 (4270)	4.3 (110)	4.3 (110)	5	6	10000 (4500)	
	132 (3350)	92.1 (2340)	163.8 (4160)	179.9 (4570)	4.3 (110)	4.3 (110)	5	6	10000 (4500)	
	147.5 (3750)	100.0 (2540)	179.5 (4560)	195.7 (4970)	4.3 (110)	4.3 (110)	5	6	10000 (4500)	
Full Free-Lift 2-Stage (FV)	120 (3050)	83.1 (2110)	152.2 (3865)	168.1 (4270)	51.0 (1295)	35.0 (890)	5	6	10000 (4500)	
	132 (3350)	92.1 (2340)	164.0 (4165)	179.9 (4570)	60.0 (1525)	44.1 (1120)	5	6	10000 (4500)	
Full Free-Lift 3-Stage (FSV)	159.5 (4050)	81.1 (2060)	191.5 (4865)	207.5 (5270)	49.0 (1245)	33.1 (840)	5	5	10000 (4500)	
	171.5 (4350)	85.6 (2175)	203.4 (5165)	219.3 (5570)	53.5 (1360)	37.6 (955)	5	5	10000 (4500)	
	187 (4750)	92.1 (2340)	219.1 (5565)	235.0 (5970)	60.0 (1525)	44.1 (1120)	5	5	10000 (4500)	
	199 (5050)	98.0 (2490)	230.9 (5865)	246.9 (6270)	65.9 (1675)	50.0 (1270)	5	5	9950 (4400)	
	218.5 (5550)	105.9 (2690)	250.6 (6365)	266.5 (6770)	73.8 (1875)	57.9 (1470)	5	5	9600 (4350)	
238 (6050)	115.8 (2940)	270.3 (6865)	286.2 (7270)	83.7 (2125)	67.7 (1720)	5	5	8800 (3990)		

MAST TYPE	MAXIMUM FORK HEIGHT (TOP OF FORKS)	OVERALL HEIGHT			FREE-LIFT		TILT RANGE		LOAD CAPACITY AT 24 IN. (610 MM) LOAD CENTER	
		LOWERED	EXTENDED		WITHOUT LOAD BACKREST	WITH STANDARD LOAD BACKREST	FWD	BWD	STANDARD TREAD	lb (kg)
			WITHOUT LOAD BACKREST	WITH STANDARD LOAD BACKREST <sup>3</sup>						
in (mm)	in (mm)	in (mm)	in (mm)	in (mm)	in (mm)	deg	deg	lb (kg)	lb (kg)	
<b>8FGC55U-BCS</b>										
Wide Visible (V)	120.5 (3060)	86.6 (2200)	152.8 (3880)	174.6 (4435)	4.7 (120)	4.7 (120)	5	6	12000 (5500)	
	132.5 (3360)	92.5 (2350)	164.6 (4180)	186.4 (4735)	4.7 (120)	4.7 (120)	5	6	12000 (5500)	
	148 (3760)	102.4 (2600)	180.3 (4580)	202.2 (5135)	4.7 (120)	4.7 (120)	5	6	12000 (5500)	
Full Free-Lift 3-Stage (FSV)	160 (4060)	81.1 (2060)	191.9 (4875)	214.0 (5435)	45.7 (1160)	27.2 (690)	5	6	12000 (5500)	
	171.5 (4360)	85.6 (2175)	203.7 (5175)	225.8 (5735)	50.2 (1275)	31.7 (805)	5	6	12000 (5500)	
	187.5 (4760)	92.1 (2340)	219.4 (5573)	241.5 (6135)	56.7 (1440)	38.2 (970)	5	6	11800 (5350)	
	199 (5060)	98.0 (2490)	231.3 (5875)	253.4 (6435)	62.6 (1590)	44.1 (1120)	5	6	11600 (5260)	
	211 (5360)	99.6 (2530)	243.1 (6175)	265.2 (6735)	64.2 (1630)	45.7 (1160)	5	6	11250 (5100)	
	219 (5560)	102.4 (2600)	251.0 (6375)	273.0 (6935)	66.9 (1700)	48.4 (1230)	5	6	11250 (5100)	
238.5 (6060)	115.8 (2940)	270.7 (6875)	292.7 (7435)	80.3 (2040)	61.8 (1570)	5	6	10900 (4940)		

1 Height of standard load backrest is 48" (1220 mm).  
 2 238 FSV requires wide tread.  
 3 Height of standard load backrest is 54" (1370 mm).



## COUNT ON THE LEADER

- ▶ Toyota leads in quality, durability, reliability and value, thanks to advanced technology and the world-renowned Toyota Production System.
- ▶ With the broadest and most complete set of material-handling solutions in the industry, Toyota Dealers specialize in meeting all of your needs — from a single forklift to an entire fleet.
- ▶ Toyota's industry-leading network of dealers backs every forklift with proven product support. Resources include factory-trained service technicians, Toyota Genuine Parts, and flexible leasing and financing packages through Toyota Commercial Finance.

- ▶ Toyota forklifts have ranked No. 1 in safety and quality since 2002, according to studies conducted by Peerless Research Group.

For more information, including full specs, see your Toyota Dealer or [ToyotaForklift.com](http://ToyotaForklift.com).

 **TOYOTA**  
**INDUSTRIAL EQUIPMENT**  
**REACH NEW HEIGHTS**

Some product features described herein are optional. Please consult your dealer for specifications. Details of specifications and equipment are based on information available at time of printing and may change without notice.