



MF1700 Series Compact Tractors Pocket Guide

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1700E Series



Model Overview



Model	1734E	1739E
Engine HP (kW)	34 (25.3) @ 2600 RPM	38.5 (28.7) @ 2800 RPM
PTO HP (kW)	Gear: 29.0 (21.6) HST: 27.2 (20.3)	Gear: 32.8 (24.5) HST: 30.9 (23.0)
Engine Type	Shibaura 1.5L 3-cylinder Diesel, Tier 4	
Transmission	9x3 Constant Mesh / 3-range Hydrostatic (HST)	
Hydraulics	6.7 gpm (25.5 Lpm)	7.2 gpm (27.3 Lpm)
Configuration	4wd only; Open Platform with ROPS	

Model Overview



Model Progression

- MF1700E replaces MF1500 in HP range
- MF1700E is low-cost economy compact tractor

Massey Ferguson 1700E Series Compact

New Models		Replaced Models	
MF1726*	24.0 HP	MF1526	24.8 HP
		MF1529	28.4 HP
		MF1532	32.5 HP
MF1734E	34 HP	MF1533	33.0 HP
MF1739E	38.5 HP	MF1540	40.1 HP

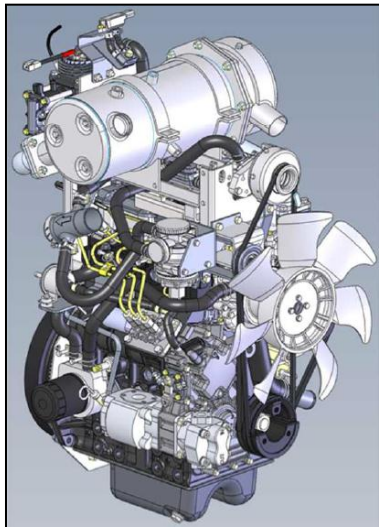
* Expected availability mid/late 2014

Engine



Common Shibaura Engine in All Models

- Model N843T-F 3-cylinder engine
- Manufactured by Shibaura (Japan)
- 1.5 liter (91.5 cu in) displacement
- Turbocharged
- Indirect injection, individual unit injectors
- Electronic engine management
- Structural block. Side support rails included when loader is installed
- Hand throttle on all models, foot throttle on gears models
- EPA Tier 4 Final emissions compliant



Engine

EPA Tier 4i Emissions Compliant

- Exhaust Gas Recirculation (EGR)
- Diesel Oxidation Catalyst (DOC)
- Diesel Particulate Filter (DPF)

- DPF Cleaning/Regeneration
 - Fully automated
 - Requires no operator input
 - No change in tractor operation (under normal regeneration process)
 - Regeneration interval depends on machine use.



Transmission

Gear: 9x3 Constant Mesh

- 3 ranges, non-synchronized, left side in-line hand lever
- 3 gears + Reverse, non-synchronized, lever centered under steering wheel
- Dry disc main clutch
- Foot clutch pedal left side floor

HST: 3-Range Hydrostatic

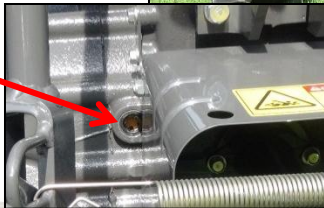
- Left side in-line range lever
- Heel-toe rocker pedal, right side
- Dry disc main clutch
- Foot clutch pedal right side floor



Rear Axle

Heavy Duty Cast Steel Rear Axle

- Bull-gear reduction with flange
- Internal wet disc brakes
 - Mechanically engaged
- Individual LH and RH brake pedals
- Parking brake via brake pedal lock
- Mechanical rear differential lock
 - Right heel pedal engagement
- Sight glass oil level check



Front Axle

Mechanical 4wd Front Axle

- Solid cast steel construction
- Bevel gear design
 - High ground clearance
 - High steering angle (52 degrees)
- Ring and pinion gear reduction
- Hydrostatic power steering
 - Double-end hydraulic cylinder
- Center driveline, open differential
 - 6-8 degrees of even axle oscillation
- Mechanical engagement via hand lever
- 4-wheel braking when engaged



Power Take Off



Rear Power Take Off (PTO)

- 540 RPM PTO standard
 - 6-spline 1 3/8" 540 shaft
- Two types of PTO's available
 - Transmission driven (live)
 - Independent
- Mechanically engaged via levers



Transmission Driven	Independent
540 PTO Speed	540 PTO Speed
2455 Engine RPM	2455 Engine RPM

Power Take Off

Transmission Driven PTO

- Often called a “Live” PTO
- Dependent on main transmission clutch
 - Press foot clutch – PTO and transmission disengages
 - Release foot clutch – PTO and transmission engages
- Hand lever selects PTO gear
 - Main clutch must be pressed
- Overrunning clutch in PTO allows implement to “coast” to a stop

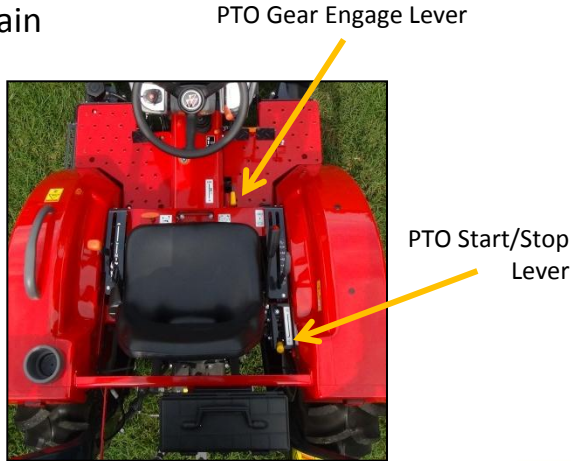


Power Take Off



Independent PTO

- PTO driveline independent of main transmission clutch
 - No foot clutch required for operation
- Hand lever selects PTO gear
 - Lever located on right side floor area
- Second hand lever starts PTO
 - Mechanical clutch
 - Simple on/off operation



Hydraulics



Open Center Hydraulic System

- Two gear-type pumps
 - Steering and implement
- 2130 PSI operating pressure
- Up to 2 rear remote valves available
 - Field installed only
- Available loader valves and joystick
 - Attach to loader mounts
 - Field installed with loader



Model	Steering Flow	Implement Flow	Total Flow
1734E	3.8 gpm	6.2 gpm	10.0 gpm
1739E	4.1 gpm	6.6 gpm	10.7 gpm

3-Point Hitch

Rear 3-Point Hitch

- ASAE Category I hitch
- Mechanical control, right hand
 - Position control only
- Screw-adjust stabilizers
- Fixed ball ends
- Single lift arm height adjustment
- Adjustable top link
 - Length and position



Lift Capacity	@ Ball Ends	@ 24"
Standard	2,205 lb (1000 kg)	1,598 lb (725 kg)

Operator's Area

Standard Platform Features

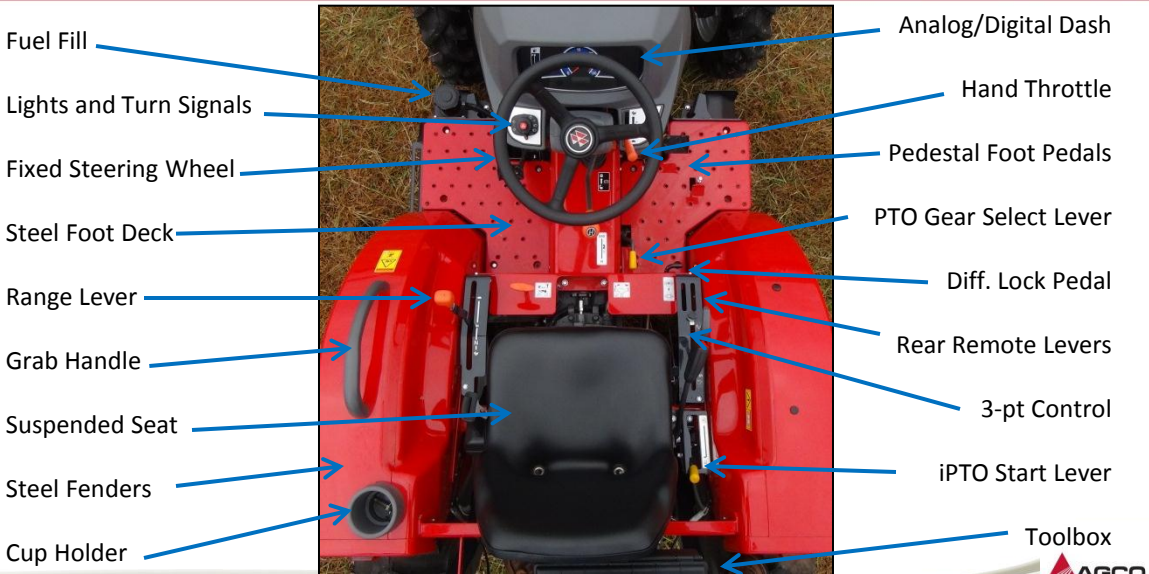
- Left side step/handle for entry
- Semi-flat platform, perforated steel foot deck for durability
- Steel fenders
- Folding ROPS with marker lights
- Fixed Steering
- Suspended vinyl seat with retractable seatbelt
- Analog and digital front dash
- Pedestal foot pedals
- Intuitive layout of controls



Operator's Area



Operator's Area



Service

Service Items

- 10 gallon fuel tank under platform – ground level fill
- Single piece raising steel hood with simple pull latch
- Easy access to:
 - Engine oil check
 - Engine air filter
 - Battery
 - Radiator cleaning
 - Transmission check
 - Rear axle sight glass



Loaders



Loader Features

- L100 Front loader
- Simple straight boom design
- Quick attach main frame
- Built-in parking stands
- Joystick mounted to loader sub-frames
- Quick-connect valves
- Sub-frame rails for added strength
- Can be factory installed



Loaders



Loader Tools

- Direct connection to bucket
- Bucket level indicator
- Grill guard
- Pin type or skid steer quick attachment for tools
- Tools available:
 - Buckets
 - Pallet forks
- Accessories
 - Rear weight frame
 - Rear ballast box



Specifications



Performance

	1734E	1739E
Rated Engine HP (kW)	34.0 (25.4)	38.5 (28.7)
Rated Engine Speed	2600 RPM	2800 RPM
Rated PTO HP (kW)	29.0 (21.6) gear, 27.2 (20.3) HST	32.7 (24.4) gear, 30.8 (23.0) HST
Rated Torque	68.8 lb ft @ 2600 RPM	72.2 lb ft @ 2800 RPM
Maximum Torque	82.6 lb ft @ 1600 RPM	82.6 lb ft @ 1600 RPM
Torque Rise	20.1%	14.4%



Specifications



Engine

Make	IHI Shibaura Machinery
Model	N843T-F
Cylinders	3
Bore x Stroke	3.31" x 3.54"
Displacement	1.5 L (91.3 in ³)
Compression	22.5:1
Intake	Single stage dry
Aspiration	Turbocharged
Injection	Indirect, low pressure
Valves	2 / cylinder
Engine Control	Electronic
Low / High Idle	975 RPM / 2835 RPM

EPA Compliance	Tier 4
Emissions Components	Internal EGR, DPF
Diesel Particulate Filter	Ceramic wall flow type
Regeneration Modes	Active / Passive
Regeneration Control	Automatic
Starting Aid	Glow plug
Alternator	65 amp
Starter	12 V, 1.7 kW
Battery	600 CCA

Specifications



Transmission

Mechanical Transmission	
Type	Constant Mesh
Gears	3 forward, 1 reverse; all non-synchronized
Ranges	3, non-synchronized
Clutch Type	Dry single disc
Disc Diameter	8.6 in (225 mm)
Gear Shift Lever	Center of platform
Range Lever	Left side, in-line
Forward Speeds	9
Reverse Speeds	3
Foot Pedals	Clutch, brakes, throttle

Hydrostatic Transmission (HST)	
Type	Variable swash plate
Speeds	Infinite
Ranges	3
Clutch Type	Dry single disc
Disc Diameter	8.6 in (225 mm)
Range Lever	Left side, in-line
HST Controls	Mechanical; heel / toe rocker pedal
Cruise Control	None
Foot Pedals	Clutch, brakes

Specifications



Axles

Rear Axle Type	Cast Steel Flange
Reduction	Bull gear
Differential Lock	Mechanical, foot pedal
Brakes	Internal wet disc
Brakes Actuation	Mechanical
Front Axle Type	4wd only
4wd Reduction	Bevel gear
4wd Engagement	Mechanical lever
4wd Lead Ratio	1.5167
Steering	Hydrostatic
Steering Angle	52 degrees
Parking Brake	Uses foot brakes

Hydraulic System

System Type	Open center, gear pump
System Pressure	2,132 psi (147 bar)
Implement Flow gpm	1734E = 6.2 gpm 1739E = 6.6 gpm
Steering Flow	1734E = 3.8 gpm 1739E = 4.1 gpm
Rear Valves	Up to 2
3-point Hitch Type	ASAE Category 1
Ball Ends	Fixed
Adjustment	Single lift arm
Control	Position only
Lift Capacity @ 24"	1598 lbs
Lift Capacity @ Balls	2205 lbs

Specifications



Speed Chart (MPH) with Mechanical Transmission

Shift Position	Tires	1734E Mechanical Transmission			1739E Mechanical Transmission		
		R1 Ag.	R3 Turf	R4 Ind.	R1 Ag.	R3 Turf	R4 Ind.
		Front	7-16	27x8.50-15	27x8.50-15	7-16	27x8.50-15
	Rear	11.2-24	38x14.00-20	15x19.5	11.2-24	38x14.00-20	15x19.5
Range	Gear	Forward Speed (MPH)					
Low	1	1.00	0.88	0.90	1.07	0.94	0.97
	2	1.39	1.22	1.25	1.50	1.31	1.35
	3	1.92	1.68	1.73	2.07	1.81	1.86
Medium	1	2.60	2.28	2.34	2.80	2.45	2.52
	2	3.61	3.16	3.25	3.88	3.41	3.50
	3	4.99	4.37	4.49	5.37	4.71	4.83
Hi	1	6.40	5.61	5.76	6.89	6.05	6.20
	2	8.88	7.79	7.99	9.56	8.38	8.61
	3	12.28	10.77	11.05	13.22	11.59	11.90
Max. Speed (Max. Throttle)		13.26	11.63	11.94	14.29	12.53	12.86
Range	Gear	Reverse Speeds (MPH)					
Low	Reverse	1.16	1.01	1.04	1.25	1.09	1.12
Medium	Reverse	3.01	2.63	2.70	3.24	2.84	2.91
High	Reverse	7.40	6.49	6.66	7.97	6.98	7.17

Specifications



Speed Chart (MPH) with Hydrostatic Transmission

Shift Position	1734E HST Transmission			1739E HST Transmission		
	R1 Ag.	R3 Turf	R4 Ind.	R1 Ag.	R3 Turf	R4 Ind.
	7-16	27x8.50-15	27x8.50-15	7-16	27x8.50-15	27x8.50-15
	11.2-24	38x14.00-20	15x19.5	11.2-24	38x14.00-20	15x19.5
Range	Forward Speed (MPH) @ Rated Engine Speed					
Low	3.72	3.26	3.34	4.00	3.51	3.60
Medium	6.05	5.31	5.45	6.52	5.72	5.87
Hi	13.62	11.94	12.26	14.66	12.86	13.20
Max. Speed	14.72	12.91	13.25	15.84	13.89	14.26
Range	Reverse Speeds (MPH) @ Rated Engine Speed					
Low	2.89	2.54	2.60	3.11	2.73	2.80
Medium	4.71	4.13	4.24	5.07	4.45	4.56
High	10.59	9.29	9.53	11.41	10.00	10.27

Specifications



Rear PTO

PTO Speed	540 RPM only
PTO Shaft Design	1 3/8 inch, 6-spline
Engine @ 540 PTO Speed	2455 engine RPM
PTO Gear Selection	Mechanical, hand lever
PTO Speed Indicator	None

Transmission Driven PTO

PTO Engagement	Foot clutch pedal
Overrunning Clutch	Standard
Compatible Models	1734E, 1739E HST

Independent Driven PTO

PTO Engagement	Foot clutch pedal
Compatible Models	1739E gear

Fluid Capacities

Engine Crankcase Oil	4.9 qts (4.6 L)
Cooling System	5.3 qts (5 L)
Coolant Type	50/50 Mix
Fuel Tank	10 gal (38 L)
Transmission	10 gal (38 L)
4wd Axle	5.9 qts (5.6 L)
Grease Type	Lithium Base #2

Miscellaneous

Max. Operating Angle	20 degrees
Turning Radius	9.2 ft (2.8 m) w/ R1
Electrical Socket	None

Specifications



Axle Weight Capacities and Ground Clearance

	1734E	1739E
Front Axle Capacity	2,205 lb (1000 kg)	2,205 lb (1000 kg)
Rear Axle Capacity	2,205 lb (1000 kg)	2,205 lb (1000 kg)
Total Machine Capacity	4,409 lb (2000 kg)	4,409 lb (2000 kg)
Ground Clearance	11.0 in (280 mm) w/ R1 tires	11.0 in (280 mm) w/ R1 tires

Tire Sizes (front/rear)

4wd R1 Ag Tires	7-16 6 ply / 11.2x24 4 ply	7-16 6 ply / 11.2x24 4 ply
4wd R3 Turf Tires	27x8.50-15 4 ply / 38x14.00-20 4 ply	27x8.50-15 4 ply / 38x14.00-20 4 ply
4wd R4 Industrial Tires	27x8.50-15 6 ply / 15x19.5 6 ply	27x8.50-15 6 ply / 15x19.5 6 ply

Tread Spacing

Tire Type	R1 Ag Tires	R3 Turf Tires	R4 Industrial Tires
Tread Spacing (front / rear)	42.7 in / 45.1 in	40.0 in / 43.5 in	42.7 in / 45.1 in

Specifications



Tractor Dimensions

	1734E	1739E
Overall Length	116.5 in (2960 mm)	116.5 in (2960 mm)
Min. Width w/ R1 Tires	52.4 in (1330 mm)	52.4 in (1330 mm)
Min. Width w/ R3 Tires	58.1 in (1475 mm)	58.1 in (1475 mm)
Wheelbase	65.9 in (1675 mm)	65.9 in (1675 mm)
Height Over ROPS w/ R1 Tires	97.6 in (2480 mm)	97.6 in (2480 mm)
Height Over ROPS w/ R3 Tires	94.9 in (2410 mm)	94.9 in (2410 mm)
Weight 4wd ROPS Gear	2734 lb (1240 kg)	2756 lb (1250 kg)
Weight 4wd ROPS HST	2745 lb (1245 kg)	2767 lb (1255 kg)

Specifications



Loader Capacities

Loader Model	L100
Lift Height @ Pivot	97 in
Lift Capacity @ Pivot	1202 lbs
Breakout Force @ Bucket Edge	1313 lbs
Rated Hydraulic Pressure	2132 PSI
Maximum Dump Angle	34 degrees
Maximum Bucket Rollback Angle	13 degrees
Tractor Compatibility	1734E and 1739E
Tool Attachment Method	Pin-type or universal skid steer quick attach
3 rd Function Capability	None

1700 Series



1700 Series



Model Overview



Model	1736	1742	1749	1754	1758	1759
Engine HP	36.2	41.6	48.3	53.6	59.0	59.0
PTO HP	27.5 /	32.8 /	39.0 /	42.1 /	NA /	45.6 /
Gear / HST	26.3	31.6	37.8	40.9	44.4	NA
Engine Type	Mitsubishi K38 1.7L 3-cylinder Diesel			Mitsubishi K39 2.2L 4-cylinder Diesel		
Transmission	12x12 Power Shuttle or Servo-HST				Servo-HST	12x12 PS
Hydraulics	11.6 gpm				12.8 gpm	
Configuration	4wd, Cab or Platform					

Model Overview



Model Progression

- MF1700 replaces MF1600 in HP range

Massey Ferguson 1700E Series Compact

New Models		Replaced Models	
1736	36.2	1635	35.7
1742	41.6	1643	43.5
1749	48.3	1648	47.1
1754	53.6	1652	52.2
1758	59.0	1655	55.4
1759	59.0	1660	60.0

Engine



Mitsubishi Heavy Industries Engines

- 3-cylinder and 4-cylinder engines
- Manufactured by Mitsubishi (Japan)
- Premium technology and manufacturing
- Turbocharged and intercooled
- Common rail, direct fuel injection
- Electronic engine management
- Uses AGCO's EDT for diagnostics
- Structural block. Side support rails included when loader is installed
- Hand and foot throttle on all models
- EPA Tier 4 Final emissions compliant



1736 / 1742 /
1749

1754 / 1758 /
1759

Mitsubishi K38

Mitsubishi K39

1.7L 3-cylinder

2.2L 4-cylinder

1700 Series

Engine

EPA Tier 4i Emissions Compliant

- Diesel Oxidation Catalyst (DOC)
- Diesel Particulate Filter (DPF)

- DPF Cleaning/Regeneration
 - Fully automated
 - Requires no operator input during most operations
 - No change in tractor operation (under normal regeneration process)
 - Regeneration interval depends on machine use.



Transmission

Gear: 12x12 Power Shuttle

- 3 ranges, non-synchronized, left side in-line hand lever
- 4 gears, fully synchronized, left side lever with “H” pattern shifting
- Shuttle lever on left side of steering wheel – electronic fingertip operation
- Wet disc main clutch
 - Durable, long service life
- No need to use clutch pedal when changing direction
- Ideal for loader work



Transmission



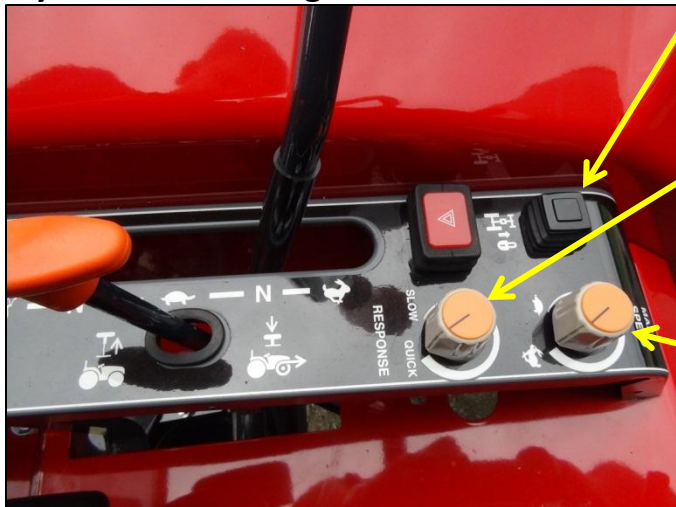
Hydrostatic: 3-Range Servo-HST

- Left side in-line range lever
- Side-by-side travel pedals
- Electronic control of HST drive units
 - Precise speed control
 - Improved performance
- Enhanced capabilities
 - Anti-stall feature
 - Push-button cruise control
 - Auto throttle
 - Max. speed adjustment
 - Response adjustment



Transmission

Hydrostatic: 3-Range Servo-HST



Cruise Control - holds travel speed when selected

Response Control – set acceleration / deceleration rate

Max. Speed Control – set maximum ground speed

Rear Axle

Heavy Duty Cast Steel Rear Axle

- Bull-gear reduction with flange
- Internal wet disc brakes
 - Mechanically engaged
- Individual LH and RH brake pedals
 - Left side of foot deck
- Parking brake via brake pedal lock
- Mechanical rear differential lock
 - Right heel pedal engagement
- Sight glass oil level check



Front Axle

Mechanical 4wd Front Axle

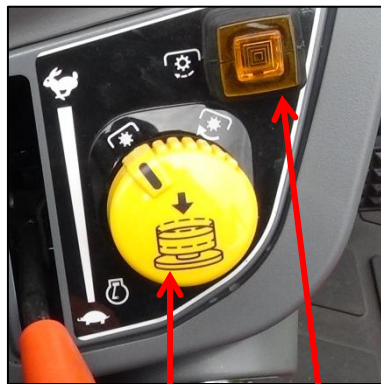
- Solid cast steel construction
- Bevel gear design
 - High ground clearance
 - High steering angle (56 degrees)
- Ring and pinion reduction
- Hydrostatic power steering
 - Double-end hydraulic cylinder
 - Debris guard over cylinder rods
- Center driveline, open differential
 - 6-8 degrees of even axle oscillation
- Mechanical engagement via left hand lever
 - 4-wheel braking when engaged



Power Take Off

Rear Power Take Off (PTO)

- Independent PTO
- 540 RPM PTO standard
 - 6-spline 1 3/8" 540 shaft
- Electro-hydraulically engaged
 - Simple knob in front dash
 - Wet clutch for durability
- Modulation button for slow, smooth startup
 - Prevents shock-load damage



PTO Start/Stop

Modulation

540 PTO Speed	HST	Mechanical <i>(Except 1759)</i>	1759
Engine Speed	2505 RPM	2428 RPM	2377 RPM

Power Take Off

External Fender Control

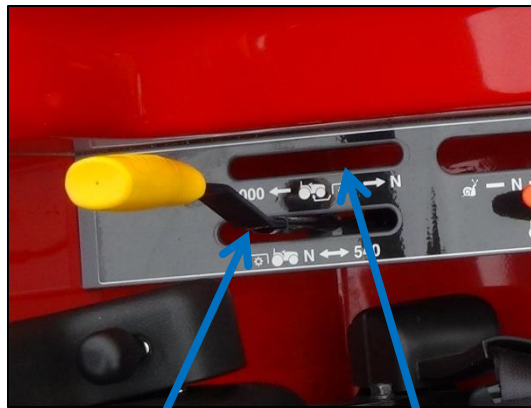
- Standard all models
 - ROPS and Cab
 - Left fender button only
- Starts and stops PTO from side of tractor
 - Transmission must be in “N”
 - Parking brake engaged
 - PTO knob in “stop” position
- Press and hold 2 seconds to start
- Simple press and release to stop
- **Always exercise caution around an actively turning PTO!!**



Power Take Off

Mid PTO Available

- Optional, field installed
- 2000 RPM speed
- 1 inch, 15-spline shaft
- Drives mid and front implements
 - Mid mowers
 - Front broom, snow blower
- Engages with rear PTO button
 - Hand lever gear selection



Rear PTO

Mid PTO

Gear Engagement Levers

Hydraulics



Open Center Hydraulic System

- Two gear-type pumps
 - Steering and implement
- 2277 PSI operating pressure to implements.
- Up to 3 rear remote valves available
 - 1 standard on all cab models
- Integrated loader joystick standard
 - Mid valves included



Model	Steering Flow	Implement Flow	Total Flow
All Except 1759	6.8 gpm	11.6 gpm	18.4 gpm
1759	6.8 gpm	12.8 gpm	19.6 gpm

1700 Series

3-Point Hitch

Rear 3-Point Hitch

- ASAE Category I hitch
- Mechanical control, right hand
 - Position control standard
 - Draft control optional
- Telescopic stabilizers
- Extendable ball ends
- Single lift arm height adjustment
- Adjustable top link (length and position)



Lift Capacity	1736 / 1742	1749 / 1754 / 1758	1759
@ Ball Ends	2,800 lbs	3,483 lbs	3,748 lbs
@ 24 inches	2,535 lbs	3,086 lbs	3,306 lbs

1700 Series

Operator's Area

Standard Platform Features

- Left and right side steps with handle for entry/exit
- Isolation-mounted flat platform with rubber cover for comfort
- Steel fenders
- Folding ROPS with marker lights
- Tilt steering
- Suspended vinyl seat with retractable seatbelt
- Analog and digital front dash
- Suspended foot pedals
- Intuitive layout of controls

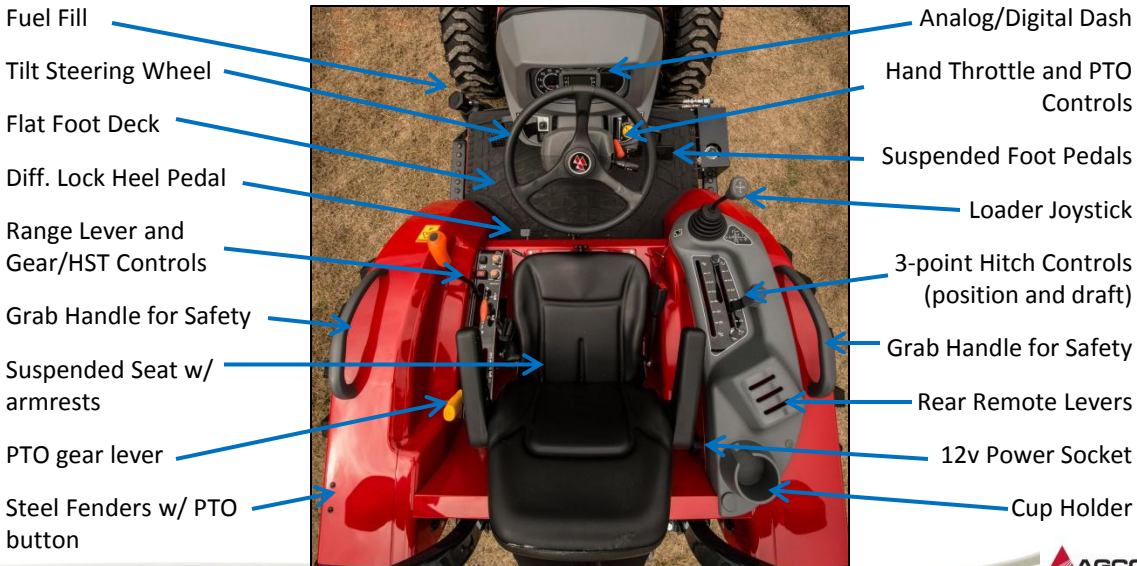


Operator's Area



1700 Series

Operator's Area



1700 Series

Operator's Area

Cab Features

- Two lockable doors
- Flat, rubber-coated foot deck
- HVAC standard
- Suspended cloth seat with armrests
- Pre-wired for stereo (includes speakers)
- 1 remote valve std
- Opening side and rear windows



Operator's Area



Cab Features

- 6-post ROPS
- Right and left external mirrors
- Front and rear roof-line lights
- Amber marker lights at mid level
- Front wiper std
- Rear wiper opt.
- Replaceable cabin air filter



Service

Service Items

- Fuel tank under platform
 - 10 gallon – 1736
 - 14.5 gallon – all others
- Single piece raising steel hood with simple pull latch
- Easy access to:
 - Engine oil check
 - Engine air filter
 - Battery
 - Radiator cleaning
 - Transmission check (rear axle sight glass)



Loaders



Loader Features

- DL120 and DL130 front loader
- Curved boom design
- Quick attach main frame
- Built-in parking stands
- Connects to tractor's mid valves (standard equipment)
- Quick-connect valves
- Sub-frame rails for added strength
- Can be factory installed



Loaders



Loader Tools

- Amplifying links for greater bucket movement and force
- Bucket level indicator
- Grill guard
- Pin type or skid steer quick attachment for tools
- Tools available:
 - Buckets
 - Pallet forks
- Accessories
 - Rear weight frame
 - Rear ballast box



Specifications



Performance

	1736	1742	1749	1754	1758	1759
Rated Engine HP (kW)	36.2 (27)	41.6 (31)	48.3 (36)	53.6 (40)	59.0 (44)	59.0 (44)
Rated Engine RPM	2500 RPM					
Rated PTO HP (kW) Gear	27.5 (20.5)	32.8 (24.5)	39.0 (29.1)	42.1 (31.4)	N/A	45.6 (34)
Rated PTO HP (kW) HST	26.3 (19.6)	31.6 (23.6)	37.8 (28.2)	40.9 (30.5)	44.4 (33.1)	N/A
Rated Engine Torque, lb ft	76.0 @ 2500 RPM	87.3 @ 2500 RPM	101.3 @ 2500 RPM	112.6 @ 2500 RPM	123.9 @ 2500 RPM	123.9 @ 2500 RPM
Maximum Engine Torque, lb ft	91.4 @ 1800 RPM	110.6 @ 1800 RPM	123.2 @ 1800 RPM	140.9 @ 1800 RPM	154.9 @ 1800 RPM	154.9 @ 1800 RPM
Torque Rise	20.2%	26.7%	21.6%	25.1%	25%	25%

Specifications

Engine

Tractor Models	1736 / 1742 / 1749	1754 / 1758 / 1759
Make	Mitsubishi Heavy Industries (MHI)	
Model	K38	K39
Cylinders	3	4
Bore x Stroke	3.39" x 3.74"	
Displacement	1.7 L (91.3 in ³)	2.2 L (134.7 in ³)
Compression	18:1	
Intake	Dual stage dry, paper element	
Aspiration	Turbocharged and intercooled	
Injection	Direct, high pressure common rail	
Valves	2 / cylinder	
Engine Control	Electronic Engine Management	
Low / High Idle	950 RPM / 2625 RPM	



Specifications



Engine

Tractor Models	All Models
EPA Compliance	Tier 4
Emissions Components	Closed crank case ventilation, throttle valve, DOC, DPF
Diesel Particulate Filter	Ceramic wall flow type, regenerating
Regeneration Modes	Active / Passive
Regeneration Control	Automatic and manual
Starting Aid	Glow plug
Alternator	50 amp ROPS, 75 amp Cab
Starter	12 V, 2.0 kW
Battery	710 CCA
Exhaust	Horizontal, right side front

Specifications



Transmission

Mechanical Transmission		Hydrostatic Transmission (HST)	
Type	Power Shuttle	Type	Variable swash plate
Gears	4 fully synchronized	Speeds	Infinite
Ranges	3, non-synchronized	Ranges	3
Clutch Type	Wet multi-disc	Range Lever	Left side, in-line
Gear Shift Lever	Left side, "H" pattern	Travel Controls	Side-by-side foot pedals
Range Lever	Left side, in-line	Hydro Unit Control	Electronic, servo-HST
Shuttle Lever	Left side steering wheel	Auto-Throttle	Standard
Shuttle Control	Electro-hydraulic	Stall Guard	Standard
Forward Speeds	12	Cruise Control	Push button
Reverse Speeds	12	Foot Pedals	Travel, brakes
Foot Pedals	Clutch, brakes, throttle		

Specifications



Axles

	1736	1742	1749	1754	1758	1759
Rear Axle Type	Solid Cast Steel Housing with Flange					
Reduction	Bull gear					
Differential Lock	Mechanical, foot pedal					
Brakes	Internal wet multi disc; 15.62 in ² braking area					
Brakes Actuation	Mechanical					
Front Axle Type	4wd only					
4wd Reduction	Bevel gear					
4wd Engagement	Mechanical lever					
4wd Lead Ratio	1.6116	1.6226				1.6837
Steering	Hydrostatic					
Steering Angle	56 degrees			57 degrees		
Parking Brake	Uses foot brakes					

Specifications



Hydraulic System and 3-pt Hitch

	1736	1742	1749	1754	1758	1759
System Type	Open center, gear pump					
System Pressure	2,277 psi (157 bar)					
Implement Flow gpm	11.6 gpm (43.8 lpm)					12.8 gpm (48.6 lpm)
Steering Flow	6.8 gpm (25.6 lpm)					
Rear Valves	Up to 3 (1 standard on cab models)					
3-point Hitch Type	ASAE Category 1					
Ball Ends	Telescopic					
Adjustment	Single lift arm					
Control	Position std. / Draft opt.					
Lift Capacity @ 24"	2535 lb (1150 kg)	3086 lb (1400 kg)			3307 lb (1500 kg)	

Specifications



Speed Chart (MPH) with Power Shuttle Transmission

1736		R1 Tires (7-16; 12.4-24)		R3 Tires (27x8.5-15; 41x14-20)		R4 Tires (10-16.5; 14.9-24)	
Range	Gear	Forward	Reverse	Forward	Reverse	Forward	Reverse
Low	1	0.22	0.21	0.21	0.19	0.23	0.22
	2	0.34	0.31	0.30	0.28	0.35	0.33
	3	0.52	0.48	0.48	0.44	0.55	0.51
	4	0.77	0.72	0.71	0.66	0.81	0.75
Medium	1	0.94	0.87	0.86	0.80	0.99	0.92
	2	1.42	1.32	1.31	1.21	1.50	1.39
	3	2.23	2.07	2.05	1.90	2.35	2.17
	4	3.30	3.05	3.03	2.80	3.47	3.21
High	1	4.37	4.05	4.01	3.71	4.59	4.25
	2	6.61	6.12	6.06	5.61	6.94	6.43
	3	10.34	9.57	9.49	8.78	10.87	10.06
	4	15.27	14.14	14.02	12.98	16.05	14.86
Max. Speed		16.04		14.71		16.85	

Specifications



Speed Chart (MPH) with Power Shuttle Transmission

1742		R1 Tires (7-16; 12.4-24)		R3 Tires (27x8.5-15; 41x14-20)		R4 Tires (10-16.5; 14.9-24)	
Range	Gear	Forward	Reverse	Forward	Reverse	Forward	Reverse
Low	1	0.22	0.20	0.20	0.19	0.23	0.21
	2	0.33	0.31	0.30	0.28	0.35	0.32
	3	0.52	0.48	0.48	0.44	0.55	0.51
	4	0.77	0.71	0.70	0.65	0.81	0.75
Medium	1	0.94	0.87	0.86	0.80	0.99	0.91
	2	1.42	1.31	1.30	1.20	1.49	1.38
	3	2.22	2.05	2.03	1.88	2.33	2.16
	4	3.28	3.03	3.01	2.78	3.44	3.19
High	1	4.34	4.02	3.98	3.69	4.56	4.23
	2	6.56	6.08	6.02	5.57	6.89	6.38
	3	10.27	9.51	9.42	8.73	10.79	9.99
	4	15.17	14.05	13.92	12.89	15.94	14.76
Max. Speed		15.93		14.62		16.74	

Specifications



Speed Chart (MPH) with Power Shuttle Transmission

1749/1754		R1 Tires (9.5-16; 13.6-28)		R3 Tires (27x10.5-15; 44x18-20)		R4 Tires (10-16.5; 14.9-24)	
Range	Gear	Forward	Reverse	Forward	Reverse	Forward	Reverse
Low	1	0.21	0.20	0.18	0.17	0.20	0.18
	2	0.32	0.30	0.28	0.26	0.30	0.28
	3	0.50	0.47	0.43	0.40	0.47	0.43
	4	0.80	0.74	0.69	0.64	0.74	0.69
Medium	1	0.91	0.84	0.78	0.72	0.84	0.78
	2	1.38	1.27	1.18	1.10	1.28	1.18
	3	2.15	1.99	1.85	1.71	2.00	1.85
	4	3.41	3.15	2.93	2.71	3.16	2.92
High	1	4.22	3.91	3.63	3.36	3.91	3.62
	2	6.37	5.90	5.48	5.07	5.91	5.47
	3	9.98	9.24	8.58	7.94	9.25	8.57
	4	15.77	14.61	13.56	12.56	14.63	13.54
Max. Speed		16.56		14.24		15.36	

Specifications



Speed Chart (MPH) with Power Shuttle Transmission

1759		R1 Tires (9.5-16; 16.9-26)		R3 Tires (27x12-15; LSW570x648)		R4 Tires (10-16.5; 14.9-24)	
Range	Gear	Forward	Reverse	Forward	Reverse	Forward	Reverse
Low	1	0.32	0.30	0.27	0.25	0.31	0.30
	2	0.46	0.44	0.38	0.36	0.45	0.43
	3	0.65	0.62	0.54	0.51	0.64	0.61
	4	0.92	0.87	0.76	0.72	0.90	0.85
Medium	1	1.44	1.36	1.19	1.12	1.41	1.33
	2	2.07	1.96	1.72	1.62	2.03	1.92
	3	2.92	2.76	2.42	2.29	2.86	2.71
	4	4.11	3.89	3.41	3.22	4.03	3.81
High	1	6.25	5.91	5.17	4.89	6.12	5.78
	2	9.02	8.53	7.47	7.06	8.83	8.34
	3	12.72	12.02	10.52	9.95	12.45	11.76
	4	17.89	16.91	14.81	14.00	17.51	16.55
Max. Speed		18.79		15.55		18.39	

Specifications



Speed Chart (MPH) with Hydrostatic Transmission

Shift Position	1736 HST Transmission			1742 HST Transmission		
	R1 Ag.	R3 Turf	R4 Ind.	R1 Ag.	R3 Turf	R4 Ind.
	7-16	27x8.50-15	10-16.5	7-16	27x8.50-15	10-16.5
	12.4-24	41x14.00-20	14.9-24	12.4-24	41x14.00-20	14.9-24
Range	Forward Speed (MPH) @ Rated Engine Speed					
Low	3.75	3.44	3.95	3.73	3.42	3.91
Medium	8.49	7.79	8.92	8.43	7.74	8.86
Hi	17.21	15.79	18.08	17.09	15.68	17.96
Max. Speed	18.07	16.58	18.98	17.95	16.47	18.86
Range	Reverse Speeds (MPH) @ Rated Engine Speed					
Low	3.00	2.75	3.16	2.98	2.73	3.13
Medium	6.79	6.23	7.14	6.75	6.19	7.09
High	13.76	12.63	14.47	13.67	12.55	14.37

Specifications



Speed Chart (MPH) with Hydrostatic Transmission

Shift Position	1749, 1754, 1758 HST Transmission		
	R1 Ag.	R3 Turf	R4 Ind.
	9.5-16	27x10.5-15	10-16.5
	13.6-28	44x18.00-20	17.5L-24
Range	Forward Speed (MPH) @ Rated Engine Speed		
Low	4.12	3.54	3.87
Medium	8.85	7.61	8.33
Hi	18.88	16.22	17.76
Max. Speed	19.82	17.04	18.65
Range	Reverse Speeds (MPH) @ Rated Engine Speed		
Low	3.29	2.83	3.10
Medium	7.08	6.08	6.66
High	15.10	12.98	14.20

Rear PTO Specifications

PTO Type	Independent
PTO Speed	540 RPM only
PTO Shaft Design	1 3/8 inch, 6-spline
Engine @ 540 PTO Speed	See page 42
PTO Gear Selection	Mechanical, hand lever
PTO Engagement	Electro-hydraulic
Main PTO Control	2-Stage Button
Rear PTO Control	Rear Fender Button
PTO Modulation	Push Button
PTO Speed Indicator	None

Specifications



Fluid Capacities

	1736	1742	1749	1754	1758	1759
Engine Crankcase Oil	6.7 qts (6.3 L)			8.7 qts (8.2 L)		
Engine Oil Type	SAE 5W-30 or SAE 10W-30					
Cooling System (50/50 Mix)	6.3 qts (6.0 L)	6.7 qts (6.3 L)		7.7 qts (7.3 L)		
Fuel Tank	10.56 gal (40 L)	14.52 gal (55.0 L)				
Transmission (Permatran III)	8.18 gal (31 L)		10.0 gal (38.0 L)			11.5 gal (43.0 L)
4wd Axle (Permatran II)	7.9 qts (7.5 L)		9.0 qts (8.5 L)			
Grease Type	Lithium Base #2					

Specifications



Axle Weight Capacities

	1736 / 1742	1749 / 1754 / 1758 / 1759
Front Axle Capacity	3,969 lb (1800 kg)	4,631 lb (2100 kg)
Rear Axle Capacity	3,969 lb (1800 kg)	4,631 lb (2100 kg)
Total Machine Capacity	6,615 lb (3000 kg)	8,379 lb (3800 kg)

Specifications



Tractor Dimensions – ROPS Power Shuttle

	1736	1742	1749	1754	1759
Rear Tire Size	13.6-26 R1		16.9-24 R1		16.9-26 R1
Overall Height in (mm)	99.2 (2520)	102.8 (2610)	102.4 (2600)		103.1 (2620)
Overall Length in (mm)	122 (3100)	130.7 (3320)	132.3 (3360)		134.6 (3420)
Minimum Width in (mm)	64.2 (1630)		65.4 (1660)		71.1 (1805)
Wheelbase in (mm)	69.7 (1770)	71.1 (1805)	76.1 (1930)		77.2 (1960)
Ground Clearance in (mm)	15.4 (390)		14.8 (375)		
Front Wheel Tread in (mm)	44.5 (1130)		52.8 (1340)		
Rear Wheel Tread in (mm)	49.8 – 61.9 (1265 – 1570)		52.4 – 64.4 (1330 - 1635)		53.4 – 63.4 (1355 – 1610)
Turning Radium in (mm)	98.4 (2550)				
Machine Weight lb (kg)	3362 (1525)	3638 (1650)	3913 (1775)	4145 (1880)	4346 (1970)
Max. Operating Angle	20 degrees all directions				

Specifications



Tractor Dimensions – Cab Power Shuttle

	1736	1742	1749	1754	1759
Rear Tire Size	13.6-26 R1		16.9-24 R1		16.9-26 R1
Overall Height in (mm)	91.3 (2320)		92.9 (2360)		93.3 (2370)
Overall Length in (mm)	122 (3100)	130.7 (3320)	132.3 (3360)		134.6 (3420)
Minimum Width in (mm)	64.2 (1630)		65.4 (1660)		71.1 (1805)
Wheelbase in (mm)	69.7 (1770)	71.1 (1805)	76.1 (1930)		77.2 (1960)
Ground Clearance in (mm)	15.4 (390)		14.8 (375)		
Front Wheel Tread in (mm)	44.5 (1130)		52.8 (1340)		
Rear Wheel Tread in (mm)	49.8 – 61.9 (1265 – 1570)		52.4 – 64.4 (1330 - 1635)		53.4 – 63.4 (1355 – 1610)
Turning Radium in (mm)	98.4 (2550)				
Machine Weight lb (kg)	3803 (1725)	4067 (1845)	4354 (1975)	4575 (1975)	4784 (2170)
Max. Operating Angle	20 degrees all directions				

Specifications



Tractor Dimensions – ROPS HST

	1736	1742	1749	1754	1758
Rear Tire Size	13.6-26 R1		16.9-24 R1		
Overall Height in (mm)	99.2 (2520)	102.8 (2610)	102.4 (2600)		
Overall Length in (mm)	122 (3100)	130.7 (3320)	132.3 (3360)		
Minimum Width in (mm)	64.2 (1630)		65.4 (1660)		
Wheelbase in (mm)	69.7 (1770)	71.1 (1805)	76.1 (1930)	77.2 (1960)	
Ground Clearance in (mm)	15.4 (390)		14.8 (375)		
Front Wheel Tread in (mm)	44.5 (1130)		52.8 (1340)		
Rear Wheel Tread in (mm)	43.9 – 55.9 (1115 – 1420)		52.4 – 64.4 (1330 - 1635)		
Turning Radium in (mm)	98.4 (2550)				
Machine Weight lb (kg)	3395 (1540)	3671 (1665)	3946 (1790)	4178 (1895)	
Max. Operating Angle	20 degrees all directions				

Specifications



Tractor Dimensions – Cab HST

	1736	1742	1749	1754	1758
Rear Tire Size	13.6-26 R1		16.9-24 R1		
Overall Height in (mm)	91.3 (2320)		92.9 (2360)		
Overall Length in (mm)	122 (3100)	130.7 (3320)	132.3 (3360)		
Minimum Width in (mm)	64.2 (1630)		65.4 (1660)		
Wheelbase in (mm)	69.7 (1770)	71.1 (1805)	76.1 (1930)	77.2 (1960)	
Ground Clearance in (mm)	15.4 (390)		14.8 (375)		
Front Wheel Tread in (mm)	44.5 (1130)		52.8 (1340)		
Rear Wheel Tread in (mm)	43.9 – 55.9 (1115 – 1420)		52.4 – 64.4 (1330 - 1635)		
Turning Radium in (mm)	98.4 (2550)				
Machine Weight lb (kg)	3836 (1740)	4101 (1860)	4387 (1990)	4608 (2090)	
Max. Operating Angle	20 degrees all directions				

Specifications



Loader Capacities

Loader Model	DL120	DL130
Lift Height @ Pivot	102 in (2591 mm)	113.5 in (2883 mm)
Lift Capacity @ Pivot	1900 lb (862 kg)	2527 lb (1146 kg)
Lift Capacity @ 19.5" Forward	1314 lb (596 kg)	1803 lb (818 kg)
Breakout Force @ Bucket Edge	1841 lb (835)	2307 lb (1046 kg)
Maximum Dump Angle	47 degrees	48 degrees
Maximum Bucket Rollback Angle	30 degrees	28 degrees
Tractor Compatibility	1736 / 1742	1749 / 1754 / 1758 / 1759
Tool Attachment Method	Pin Type or Skid Steer	
3 rd Function Capability	No	Yes

Web Links



Massey Ferguson Website

www.masseyferguson.us/

MF1700 Series Tractor Spec Page (English)

www.masseyferguson.us/Library/upload/massey-ferguson-1700-series-spec-sheet.pdf

MF1700E Series Tractor Spec Page (English)

www.masseyferguson.us/Library/upload/massey-ferguson-1700-series-economy-spec-sheet.pdf

AGCO Corporation Website

www.agcocorp.com/

AGCO Facebook Page

www.facebook.com/AGCOcorp

AGCO Twitter Page

www.twitter.com/AGCOcorp

AGCO YouTube Page

www.youtube.com/AGCOcorp

Conversions



TABLES OF CONVERSION FACTORS							
TO CONVERT FROM METERS TO INCHES, FOR EXAMPLE, FIND THE ROW LABELED "1 METER" AND THE COLUMN LABELED "IN." THE CONVERSION FACTOR IS 39.37. THUS, 1 METER = 39.37 IN.							
LENGTH	CM	M	KM	IN	FT	YD	MI
1 CENTIMETER	1	0.01	10^{-5}	0.3937	3.281×10^{-2}	1.094×10^{-2}	6.214×10^{-6}
1 METER	100	1	10^{-3}	39.37	3.281	1.094	6.214×10^{-4}
1 KILOMETER	10^5	1000	1	3.937×10^4	3281	1094	0.6214
1 INCH	2.54	0.0254	2.54×10^{-5}	1	0.0833	0.0278	1.578×10^{-5}
1 FOOT	30.48	0.3048	3.048×10^{-4}	12	1	0.3333	1.894×10^{-4}
1 YARD	91.44	0.9144	9.144×10^{-4}	36	3	1	5.682×10^{-4}
1 MILE	1.6093×10^5	1609.3	1.6093	6.336×10^4	5280	1760	1

VOLUME (CAPACITY)							
	CM ³	M ³	IN ³	FT ³	ℓ	OZ	GAL
1 CUBIC CENTIMETER	1	10^{-6}	0.06102	3.531×10^{-5}	1.000×10^{-3}	0.03381	2.642×10^{-4}
1 CUBIC METER	10^6	1	6.102×10^4	35.31	1000	3.381×10^4	264.2
1 CUBIC INCH	16.39	1.639×10^{-5}	1	5.787×10^{-4}	0.01639	0.5541	4.329×10^{-2}
1 CUBIC FOOT	2.832×10^4	0.02832	1728	1	28.32	957.5	7.480
1 LITER	1000	1.000×10^{-3}	61.03	0.03532	1	33.81	0.2642
1 OUNCE	29.57	2.957×10^{-5}	1.805	1.044×10^{-3}	0.02957	1	7.813×10^{-3}
1 GALLON	3785	3.785×10^{-3}	231	0.1337	3.785	128	1
1 GALLON = 4 QUARTS (QT) = 8 PINTS (PT) = 16 CUPS (C)							
1 CUP (C) = 8 ONCES (OZ) = 16 TABLESPOONS (TBSP) = 48 TEASPOONS (TSP)							

Calendar



2014

January

Mo	Tu	We	Th	Fr	Sa	Su
	1	2	3	4	5	
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30	31		

May

Mo	Tu	We	Th	Fr	Sa	Su
		1	2	3	4	
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30	31	

September

Mo	Tu	We	Th	Fr	Sa	Su
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30					

February

Mo	Tu	We	Th	Fr	Sa	Su
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28		

June

Mo	Tu	We	Th	Fr	Sa	Su
30						1
2	3	4	5	6	7	8
9	10	11	12	13	14	15
16	17	18	19	20	21	22
23	24	25	26	27	28	29

October

Mo	Tu	We	Th	Fr	Sa	Su
		1	2	3	4	5
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30	31		

March

Mo	Tu	We	Th	Fr	Sa	Su
31					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30

July

Mo	Tu	We	Th	Fr	Sa	Su
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30	31			

November

Mo	Tu	We	Th	Fr	Sa	Su
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30

April

Mo	Tu	We	Th	Fr	Sa	Su
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30				

August

Mo	Tu	We	Th	Fr	Sa	Su
				1	2	3
4	5	6	7	8	9	10
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29	30	31

December

Mo	Tu	We	Th	Fr	Sa	Su
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

