300A Auger Platform and 300 Grass Seed Special

John Deere Ottumwa Works TM1526 (08APR02)

LITHO IN U.S.A. ENGLISH

Introduction

FOREWORD

This manual is written for an experienced technician. Essential tools required in performing certain service work are identified in this manual and are recommended for use.

Live with safety: Read the safety messages in the introduction of this manual and the cautions presented throughout the text of the manual.



This is the safety-alert symbol. When you see this symbol on the machine or in this manual, be alert to the potential for personal injury.

Technical manuals are divided in two parts: repair and diagnostics. Repair sections tell how to repair the components. Diagnostic sections help you identify the majority of routine failures quickly.

Information is organized in groups for the various components requiring service instruction. At the beginning of each group are summary listings of all applicable essential tools, service equipment and tools, other materials needed to do the job, service parts kits, specifications, wear tolerances, and torque values.

Binders, binder labels, and tab sets can be ordered by John Deere dealers direct from the John Deere Distribution Service Center. This manual is part of a total product support program.

FOS MANUALS—REFERENCE

TECHNICAL MANUALS—MACHINE SERVICE

COMPONENT MANUALS—COMPONENT SERVICE

Fundamentals of Service (FOS) Manuals cover basic theory of operation, fundamentals of troubleshooting, general maintenance, and basic type of failures and their causes. FOS Manuals are for training new personnel and for reference by experienced technicians.

Technical Manuals are concise guides for specific machines. Technical manuals are on-the-job guides containing only the vital information needed for diagnosis, analysis, testing, and repair.

Component Technical Manuals are concise service guides for specific components. Component technical manuals are written as stand-alone manuals covering multiple machine applications.

DX,TMIFC -19-04JUN90

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All information, illustrations and specifications in this manual are based on the latest information available at the time of publication. The right is reserved to make changes at any time without notice.

TM1526-19-08APR02

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INDX

Section 10 General 10

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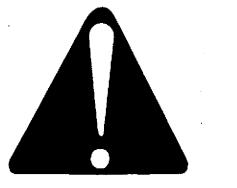
Group 20—Lubrication

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RECOGNIZE SAFETY INFORMATION

This is the safety-alert symbol. When you see this symbol on your machine or in this manual, be alert to the potential for personal injury.

Follow recommended precautions and safe operating practices.



DX,ALERT

-19-04JUN90

UNDERSTAND SIGNAL WORDS

A signal word—DANGER, WARNING, or CAUTION—is used with the safety-alert symbol. DANGER identifies the most serious hazards.

DANGER or WARNING safety signs are located near specific hazards. General precautions are listed on CAUTION safety signs. CAUTION also calls attention to safety messages in this manual.

A DANGER

A WARNING

ACAUTION

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DX,SIGNAL -19-09JAN92

HANDLE FLUIDS SAFELY—AVOID FIRES

When you work around fuel, do not smoke or work near heaters or other fire hazards.

Store flammable fluids away from fire hazards. Do not incinerate or puncture pressurized containers.

Make sure machine is clean of trash, grease, and debris.

Do not store oily rags; they can ignite and burn spontaneously.



DY ELAME

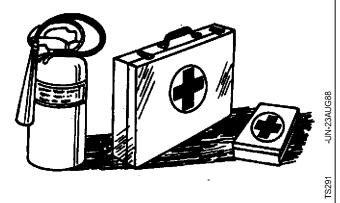
-19-04JUN90

PREPARE FOR EMERGENCIES

Be prepared if a fire starts.

Keep a first aid kit and fire extinguisher handy.

Keep emergency numbers for doctors, ambulance service, hospital, and fire department near your telephone.



DX,FIRE2 -19-04JUN90

HANDLE CHEMICAL PRODUCTS SAFELY

Direct exposure to hazardous chemicals can cause serious injury. Potentially hazardous chemicals used with John Deere equipment include such items as lubricants, coolants, paints, and adhesives.

A Material Safety Data Sheet (MSDS) provides specific details on chemical products: physical and health hazards, safety procedures, and emergency response techniques.

Check the MSDS before you start any job using a hazardous chemical. That way you will know exactly what the risks are and how to do the job safely. Then follow procedures and recommended equipment.

(See your John Deere dealer for MSDS's on chemical products used with John Deere equipment.)

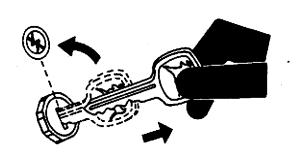


DX,MSDS,NA -19-15MAR91

PARK MACHINE SAFELY

Before working on the machine:

- Lower all equipment to the ground.
- Stop the engine and remove the key.
- Disconnect the battery ground strap.
- Hang a "DO NOT OPERATE" tag in operator station.

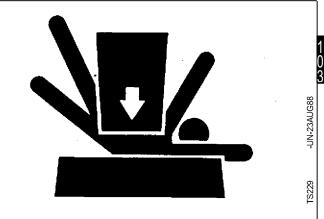


DX,PARK

19-04JUN90

Always lower the attachment or implement to the ground before you work on the machine. If you must work on a lifted machine or attachment, securely support the machine or attachment.

Do not support the machine on cinder blocks, hollow tiles, or props that may crumble under continuous load. Do not work under a machine that is supported solely by a jack. Follow recommended procedures in this manual.



DX,LOWER

-19-04JUN90

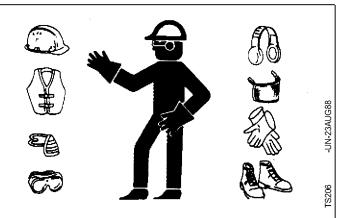
WEAR PROTECTIVE CLOTHING

Wear close fitting clothing and safety equipment appropriate to the job.

Prolonged exposure to loud noise can cause impairment or loss of hearing.

Wear a suitable hearing protective device such as earmuffs or earplugs to protect against objectionable or uncomfortable loud noises.

Operating equipment safely requires the full attention of the operator. Do not wear radio or music headphones while operating machine.



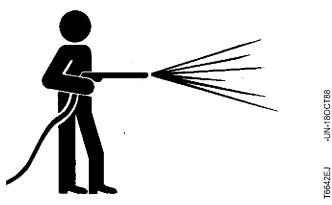
DX,WEAR

-19-10SEP90

WORK IN CLEAN AREA

Before starting a job:

- Clean work area and machine.
- · Make sure you have all necessary tools to do your job.
- · Have the right parts on hand.
- · Read all instructions thoroughly; do not attempt shortcuts.



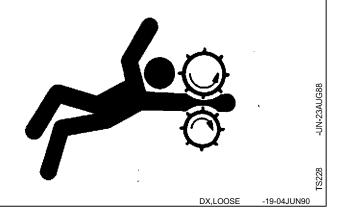
DX,CLEAN

PN=6

SERVICE MACHINES SAFELY

Tie long hair behind your head. Do not wear a necktie, scarf, loose clothing, or necklace when you work near machine tools or moving parts. If these items were to get caught, severe injury could result.

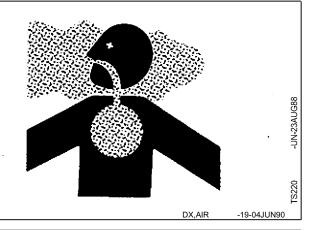
Remove rings and other jewelry to prevent electrical shorts and entanglement in moving parts.



WORK IN VENTILATED AREA

Engine exhaust fumes can cause sickness or death. If it is necessary to run an engine in an enclosed area, remove the exhaust fumes from the area with an exhaust pipe extension.

If you do not have an exhaust pipe extension, open the doors and get outside air into the area.



ILLUMINATE WORK AREA SAFELY

Illuminate your work area adequately but safely. Use a portable safety light for working inside or under the machine. Make sure the bulb is enclosed by a wire cage. The hot filament of an accidentally broken bulb can ignite spilled fuel or oil.

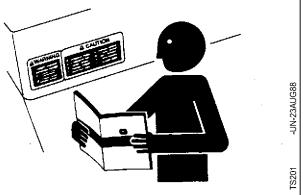


DX,LIGHT

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REPLACE SAFETY SIGNS

Replace missing or damaged safety signs. See the machine operator's manual for correct safety sign placement.



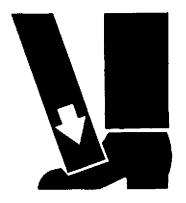
DX,SIGNS1

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USE PROPER LIFTING EQUIPMENT

Lifting heavy components incorrectly can cause severe injury or machine damage.

Follow recommended procedure for removal and installation of components in the manual.



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DX,LIFT

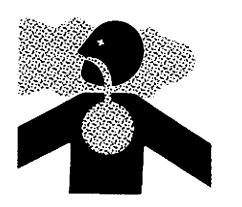
AVOID HARMFUL ASBESTOS DUST

Avoid breathing dust that may be generated when handling components containing asbestos fibers. Inhaled asbestos fibers may cause lung cancer.

Components in products that may contain asbestos fibers are brake pads, brake band and lining assemblies, clutch plates, and some gaskets. The asbestos used in these components is usually found in a resin or sealed in some way. Normal handling is not hazardous as long as airborne dust containing asbestos is not generated.

Avoid creating dust. Never use compressed air for cleaning. Avoid brushing or grinding material containing asbestos. When servicing, wear an approved respirator. A special vacuum cleaner is recommended to clean asbestos. If not available, apply a mist of oil or water on the material containing asbestos.

Keep bystanders away from the area.

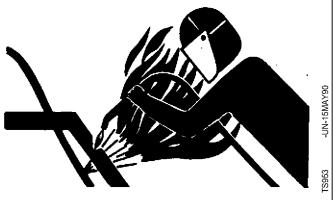


DX,DUST

-19-15MAR91

AVOID HEATING NEAR PRESSURIZED **FLUID LINES**

Flammable spray can be generated by heating near pressurized fluid lines, resulting in severe burns to yourself and bystanders. Do not heat by welding, soldering, or using a torch near pressurized fluid lines or other flammable materials. Pressurized lines can be accidentally cut when heat goes beyond the immediate flame area.



REMOVE PAINT BEFORE WELDING OR HEATING

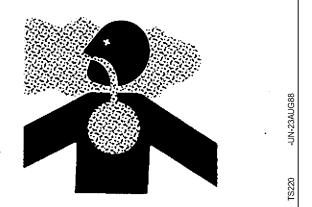
Avoid potentially toxic fumes and dust.

Hazardous fumes can be generated when paint is heated by welding, soldering, or using a torch.

Do all work outside or in a well ventilated area. Dispose of paint and solvent properly.

Remove paint before welding or heating:

- If you sand or grind paint, avoid breathing the dust. Wear an approved respirator.
- If you use solvent or paint stripper, remove stripper with soap and water before welding. Remove solvent or paint stripper containers and other flammable material from area. Allow fumes to disperse at least 15 minutes before welding or heating.



DX,PAINT -19-04JUN90

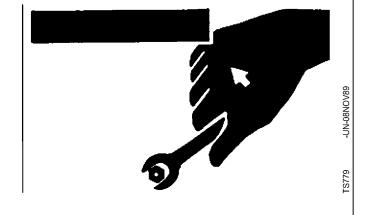
USE PROPER TOOLS

Use tools appropriate to the work. Makeshift tools and procedures can create safety hazards.

Use power tools only to loosen threaded parts and fasteners.

For loosening and tightening hardware, use the correct size tools. DO NOT use U.S. measurement tools on metric fasteners. Avoid bodily injury caused by slipping wrenches.

Use only service parts meeting John Deere specifications.



(,REPAIR -19-04JUN

DISPOSE OF WASTE PROPERLY

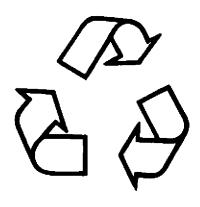
Improperly disposing of waste can threaten the environment and ecology. Potentially harmful waste used with John Deere equipment include such items as oil, fuel, coolant, brake fluid, filters, and batteries.

Use leakproof containers when draining fluids. Do not use food or beverage containers that may mislead someone into drinking from them.

Do not pour waste onto the ground, down a drain, or into any water source.

Air conditioning refrigerants escaping into the air can damage the Earth's atmosphere. Government regulations may require a certified air conditioning service center to recover and recycle used air conditioning refrigerants.

Inquire on the proper way to recycle or dispose of waste from your local environmental or recycling center, or from your John Deere dealer.



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DX,DRAIN

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LIVE WITH SAFETY

Before returning machine to customer, make sure machine is functioning properly, especially the safety systems. Install all guards and shields.



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DX,LIVE

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GENERAL INFORMATION



300A Auger Platform

The John Deere 300A Auger Platform is operated by a 3430 or 3830 Windrower. The platform consists of a reel, a cutterbar, dual knives and a single auger delivers the crop to the conditioner.

The John Deere 300 Grass Seed Special is similar to the 300A, except the center deck sheet has been removed, a lower stripper has been added, and is used without a conditioner.

EX,1526,1010,A -19-16APR92

TRACTION UNITS AND CONDITIONERS

300A and 300 Grass Seed Special Auger Platforms are designed for use on John Deere 3430 and 3830 Self Propelled Windrowers only.

300A Auger Platform and 3430 Windrower will require either a 36 or 66 Hay Conditioner.

300A Auger Platform and 3830 Windrower will require either a 31 or 61 Hay Conditioner.

300 Grass Seed Special Auger Platform does not use a Hay Conditioner.

EX,1526,1010,B -19-16APR92

ILLUSTRATIONS

The 300A and 300 Grass Seed Special are similar in design and operation.

The illustrations in this technical manual will show the 300A and the procedure can be followed on the 300 Grass Seed Special.

Where there is a difference in the procedure, it will be noted and both procedures illustrated.

EX,1526,1010,C -19-16APR92

METRIC AND CUSTOMARY DESIGN

Specifications are given in metric with the US-customary equivalent following.

Hardware specifications are given as they were designed in metric or US-customary and can not be converted.

Replace hardware with the same strength and measurement. Never replace metric with customary or customary with metric.

EX,1526,1010,D -19-16APR92

REPAIR COMPONENTS

Use only John Deere parts when replacing a component.

John Deere repair parts are selected because of fit, quality, and expected service life.

Cross referenced components between manufacturers, and will fit components may not be the quality, or have the service life of the specified John Deere part.

EX,1526,1010,E -19-16APR92

UNAUTHORIZED MODIFICATIONS



CAUTION: Unauthorized modifications may cause machine failure and personal injury.

Unauthorized modifications may affect the warranty and the service life of the machine.

EX,1526,1010,F -19-16APR92

300A AUGER PLATFORM
Cutterbar—Twin Knife:
Guards
Hold-Downs Through hardened Individually adjustable
Hold-Down Clips
Guard Angle
Center Overlap Double section overlap
Speed 1875 Strokes per minute Knife Drive Enclosed, running in oil
Cutting Height
Operating Speed
Cross Shaft Speed
Reel:
Reel Bats Four bat, standard Five and six, optional
Diameter
Speed; variable
Five and six, optional Weight:
12-Foot (3658 mm)
14-Foot (4267 mm)
Width of Cut: 12-Foot (3658 mm)
14-Foot (4267 mm)
16-Foot (4877 mm)
Auger: Diameter
Speed
Protection
Gauge Shoes
(Specifications and design subject to change without notice.)

300 GRASS SEED SPECIAL AUGER PLATFORM

Cutterbar—Twin Knife:
Guards
Non-clog Standard
Hold-Downs
Hold-Down Clips
Close to knife tip
Guard Angle
Knives (Chrome)
Center Overlap
Speed
Knife Drives
Cutting Height
Operating Speed
Cross Shaft Speed
Reel:
Number Reel Bats
Diameter
Protection
Speed; variable
Tooth bars
Weight
Width of Cut:
Auger:
Diameter
Speed
Protection
Gauge Shoes
(Specifications and design subject to change without notice.)
EX,1526,1015,B -19-16APR92

UNIFIED INCH BOLT AND CAP SCREW TORQUE VALUES

SAE Grade and Head Markings	NO MARK	1 or 2 ^b	5 5.1 5.2	8.2
SAE Grade and Nut Markings	NO MARK	2		

	Grade 1				Grade 2 ^b				G	rade 5,	5.1, or 5	5.2	Grade 8 or 8.2			
Size	Lubricateda		Drya		Lubricateda		Drya		Lubricateda		Drya		Lubricateda		Drya	
	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft
1/4	3.7	2.8	4.7	3.5	6	4.5	7.5	5.5	9.5	7	12	9	13.5	10	17	12.5
5/16	7.7	5.5	10	7	12	9	15	11	20	15	25	18	28	21	35	26
3/8	14	10	17	13	22	16	27	20	35	26	44	33	50	36	63	46
7/16	22	16	28	20	35	26	44	32	55	41	70	52	80	58	100	75
1/2	33	25	42	31	53	39	67	50	85	63	110	80	120	90	150	115
9/16	48	36	60	45	75	56	95	70	125	90	155	115	175	130	225	160
5/8	67	50	85	62	105	78	135	100	170	125	215	160	215	160	300	225
3/4	120	87	150	110	190	140	240	175	300	225	375	280	425	310	550	400
7/8	190	140	240	175	190	140	240	175	490	360	625	450	700	500	875	650
1	290	210	360	270	290	210	360	270	725	540	925	675	1050	750	1300	975
1-1/8	470	300	510	375	470	300	510	375	900	675	1150	850	1450	1075	1850	1350
1-1/4	570	425	725	530	570	425	725	530	1300	950	1650	1200	2050	1500	2600	1950
1-3/8	750	550	950	700	750	550	950	700	1700	1250	2150	1550	2700	2000	3400	2550
1-1/2	1000	725	1250	925	990	725	1250	930	2250	1650	2850	2100	3600	2650	4550	3350

DO NOT use these values if a different torque value or tightening procedure is given for a specific application. Torque values listed are for general use only. Check tightness of fasteners periodically.

Shear bolts are designed to fail under predetermined loads. Always replace shear bolts with identical grade.

Fasteners should be replaced with the same or higher grade. If higher grade fasteners are used, these should only be tightened to the strength of the original.

Make sure fasteners threads are clean and that you properly start thread engagement. This will prevent them from failing when tightening.

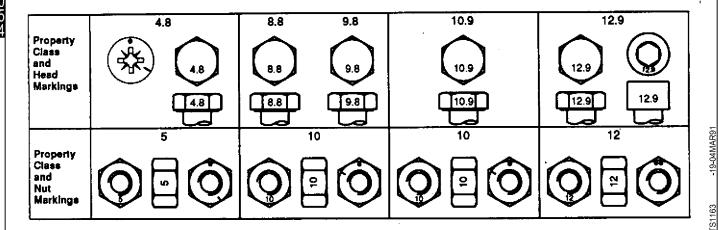
Tighten plastic insert or crimped steel-type lock nuts to approximately 50 percent of the dry torque shown in the chart, applied to the nut, not to the bolt head. Tighten toothed or serrated-type lock nuts to the full torque value.

DX,TORQ1 -19-15MAR91

^a "Lubricated" means coated with a lubricant such as engine oil, or fasteners with phosphate and oil coatings. "Dry" means plain or zinc plated without any lubrication.

^b Grade 2 applies for hex cap screws (not hex bolts) up to 152 mm (6-in.) long. Grade 1 applies for hex cap screws over 152 mm (6-in.) long, and for all other types of bolts and screws of any length.

METRIC BOLT AND CAP SCREW TORQUE VALUES



	Class 4.8				Class 8.8 or 9.8					Class	s 10.9		Class 12.9				
Size	Lubri	Lubricateda		Drya		Lubricateda		Drya		Lubricateda		Drya		Lubricateda		Drya	
	N⋅m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	N·m	lb-ft	
M6	4.8	3.5	6	4.5	9	6.5	11	8.5	13	9.5	17	12	15	11.5	19	14.5	
M8	12	8.5	15	11	22	16	28	20	32	24	40	30	37	28	47	35	
M10	23	17	29	21	43	32	55	40	63	47	80	60	75	55	95	70	
M12	40	29	50	37	75	55	95	70	110	80	140	105	130	95	165	120	
M14	63	47	80	60	120	88	150	110	175	130	225	165	205	150	260	190	
M16	100	73	125	92	190	140	240	175	275	200	350	225	320	240	400	300	
M18	135	100	175	125	260	195	330	250	375	275	475	350	440	325	560	410	
M20	190	140	240	180	375	275	475	350	530	400	675	500	625	460	800	580	
M22	260	190	330	250	510	375	650	475	725	540	925	675	850	625	1075	800	
M24	330	250	425	310	650	475	825	600	925	675	1150	850	1075	800	1350	1000	
M27	490	360	625	450	950	700	1200	875	1350	1000	1700	1250	1600	1150	2000	1500	
M30	675	490	850	625	1300	950	1650	1200	1850	1350	2300	1700	2150	1600	2700	2000	
M33	900	675	1150	850	1750	1300	220	1650	2500	1850	3150	2350	2900	2150	3700	2750	
M36	1150	850	1450	1075	2250	1650	2850	2100	3200	2350	4050	3000	3750	2750	4750	3500	

DO NOT use these values if a different torque value or tightening procedure is given for a specific application. Torque values listed are for general use only. Check tightness of fasteners periodically.

Shear bolts are designed to fail under predetermined loads. Always replace shear bolts with identical property class.

Fasteners should be replaced with the same or higher property class. If higher property class fasteners are used, these should only be tightened to the strength of the original. Make sure fasteners threads are clean and that you properly start thread engagement. This will prevent them from failing when tightening.

Tighten plastic insert or crimped steel-type lock nuts to approximately 50 percent of the dry torque shown in the chart, applied to the nut, not to the bolt head. Tighten toothed or serrated-type lock nuts to the full torque value.

DX,TORQ2 -19-05JUN91

^a "Lubricated means coated with a lubricant such as engine oil, or fasteners with phosphate and oil coatings." Dry means plain or zinc plated without any lubrication.

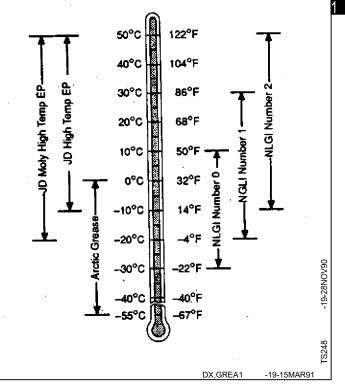
EXTREME PRESSURE OR MULTIPURPOSE GREASE

Use grease based on the expected air temperature range during the service interval.

John Deere Moly High Temperature EP Grease and John Deere High Temperature EP Grease are recommended.

Other greases that may be used are:

- SAE Multipurpose EP Grease with 3 to 5 percent molybdenum disulfide.
- SAE Multipurpose EP Grease.
- Greases meeting Military Specification MIL-G-10924C may be used as arctic grease.



GEAR OIL

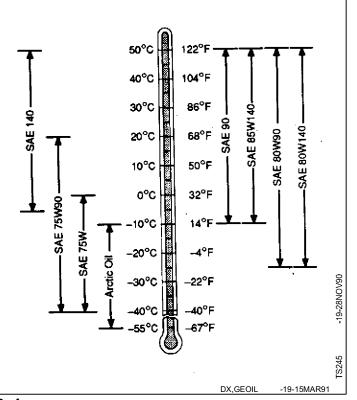
Use oil viscosity based on the expected air temperature range during the period between oil changes.

John Deere GL-5 Gear Lubricant is recommended.

Other oils may be used if they meet one or more of the following:

- API Service Classification GL-5
- Military Specification MIL-L-2105D
- Military Specification MIL-L-2105C
- Military Specification MIL-L-2105B

Oils meeting Military Specification MIL-L-10324A may be used as arctic oils.



Thank you very much for your reading. Please Click Here. Then Get COMPLETE MANUAL. NO WAITING



NOTE:

If there is no response to click on the link above, please download the PDF document first and then click on it.

LUBRICANT STORAGE

Your equipment can operate at top efficiency only if clean lubricants are used.

Use clean containers to handle all lubricants.

Store lubricants and containers in an area protected from dust, moisture, and other contamination.

DX,LUBST -19-15MAR91

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ENGAGE CYLINDER LOCKOUT

NOTE: 3430 Windrower shown. Procedure is the same for the 3830 Windrower.

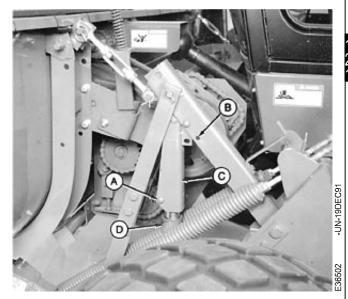
- 1. Raise platform to highest position.
- 2. Remove spring clip and pin (A) from hole (B).
- 3. Lower brace (C) into position.
- 4. Install pin (A) in brace (C) as shown.
- 5. Repeat steps 2 4 on opposite side of windrower.
- 6. Lower platform, allowing brace (C) to rest on cylinder body (D).

A—Pin

B-Hole

C—Brace

D—Cylinder Body

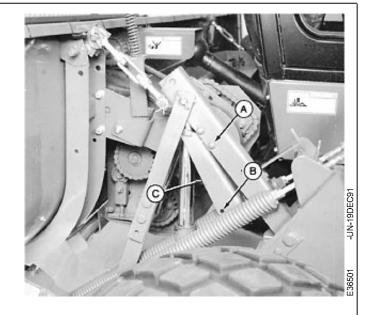


EX,1526,1025,A -19-16APR92

DISENGAGE CYLINDER LOCKOUT

NOTE: 3430 Windrower shown. Procedure is the same for the 3830 Windrower.

- 1. Raise platform.
- 2. Remove spring clip and pin (A) from hole (B).
- 3. Raise brace (C) into position.
- 4. Install pin (A) and spring clip as shown.



EX,1526,1025,B -19-16APR92