

**INSTRUCTION MANUAL**

**CARTER  
DOCKAGE  
TESTER**

**STYLE NUMBER - XT7**

**MANUAL NUMBER - 179-11**

**(Revision 00)**

**CARTER DAY**

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*READ AND FOLLOW THE GUIDELINES ESTABLISHED WITHIN THIS MANUAL TO ENSURE WARRANTY COVERAGE AND YEARS OF LOW-COST OPERATION.*

**\*\*\* WARNING \*\*\***

INTERNAL MOVING PARTS CAN BE DANGEROUS.

BEFORE ATTEMPTING SERVICE OR INTERNAL INSPECTION, DISCONNECT AND LOCKOUT ELECTRIC POWER.

DO NOT OPERATE THIS EQUIPMENT WITHOUT REQUIRED SAFETY GUARDS OR COVERS IN PLACE.

KEEP HANDS CLEAR OF INLETS AND OUTLETS.

**CARTER DAY**

# IMPORTANT

Shown below is an example of a nameplate from a Carter Day Machine. Please locate the nameplate on your machine and fill in the Order Number, Serial Number and Style Number from it onto the nameplate on the page for future reference if not already listed below. Having this information at hand when you call us for parts or service will be helpful

<b>ORDER NO.</b>	<input type="text" value="73189"/>
<b>SERIAL NO.</b>	<input type="text" value="CD015729"/>
<b>STYLE NO.</b>	<input type="text" value="XT7"/>

MANUFACTURED IN U.S.A.  
BY  
**Carter Day International, Inc.**  
500 73rd Ave., N.E., Minneapolis, MN 55432

<b>YEAR OF MANUFACTURE:</b>	<input type="text" value="2012"/>
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# **Carter Day International, Inc.**

## **Machinery Storage Requirements**

Machinery should be placed into service as soon as possible after delivery.

If storage is required Carter Day recommends the following storage guidelines for its finished products.

While in storage machinery should be protected from corrosion and contamination.

The storage area temperature should be maintained between 0 degrees C (32 degrees F) and 40 degrees C (104 degrees F), temperature fluctuations should be limited to no more than 5 degrees C per 24 hour period.

The relative humidity should be maintained below 60%.

The storage area should be kept free from airborne contaminants such as, but not limited to: dust, dirt, harmful vapors, etc.

The storage area should be isolated from undue vibration.

Extreme conditions of any kind should be avoided.

If storage exceeds one month, shafts should be rotated monthly to insure proper lubrication of the bearings.

Failure to follow these guidelines may result in reduced product performance and component life. Equipment failure attributable to corrosion or contamination will not be covered by warranty. For example corrosion will cause shaft bearing failures, typically indicated by high bearing temperatures.

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## Installation

### General

The Carter Dockage Tester is designed to check grain samples to determine the percentage of dockage contained in each sample with the use of air, the proper riddle, and sieves.

### Foundation

This machine should be set on the floor or on a solid structure. The machine base has four (4) adjustment legs that can be used to level the machine. A level has been provided on the side of the machine, to assist in setting the machine level and to obtain the proper incline for the sieves and riddle. Additionally the machine may have come equipped with the optional casters, they must be fully retracted when leveling and operating the machine to ensure accurate results.

### Speed

The Carter Dockage Tester is shipped completely assembled and a test run is made to ensure that the machine is properly adjusted.

As the speed of the machine is very important in obtaining the best results we recommend that the operator check the speed of the cam shaft. By adjusting the motor sheave, the proper speed of 146 to 148 RPM can be obtained. The brass plate located on the side plate above the cam shaft lists the proper RPM for this machine.

### Wheat - 6/1/64 Rvd.

When all of the material has cleared the Number 9 swaged-hole sieve, apply sieve cleaner by sliding the Number 9 sieve in and out several times while the machine is still operating. The sample pans should not be collected until the material unlodged by the sieve cleaner has cleared the sieve.

The dockage will then consist of the material removed by air, the material except threshed kernels of wheat that passed over the riddle, the material that passed through the bottom sieve, the material that passed over the bottom sieve, and the material that passed over the bottom sieve when such material consists of less than 50% of wheat.

When the material that passed over the bottom sieve consists of 50% or more of whole and/or broken kernels of wheat the entire sample shall be recomposited and the dockage determined in accordance with the method described in paragraph (1) above.

- 4a. Alternate Method. For wheat containing chess and/or quack grass and/or similar seed.** If the wheat (original sample) contains more than 0.5% of chess and/or quack grass and/or other weed seeds of similar size and shape (as determined on not less than 50 grams cut from the original sample), use the Number 5 sieve in the top sieve carriage, no sieve in the middle sieve carriage, and the Number 2 sieve in the bottom sieve carriage.

In samples of wheat containing relatively large amounts of chess, etc., it may be necessary to run the sample through the machine more than once to remove the excess amount of chess, etc., present in the sample

The material which passed over the bottom sieve shall be rescreened in the following manner:

Place the material on a hand sieve having 1/12" diameter round-hole perforations. Hold the sieve at an angle of from 10 to 20 degrees. Then strike the lower edge of the hand sieve with one hand in such a manner as to cause the material to bounce up and down. This will cause the chess, etc., to up-end and pass through the perforations of the sieve. Continue this operation until all of the separable dockage material has passed through the sieve. The material remaining on top of the hand sieve shall be returned to the cleaned wheat.

The dockage, except as specified in the following paragraph, will then consist of the material removed by the air, the material except wheat that passed over the riddle, the material that passed through the bottom sieve, and the material that passed through the hand sieve when such material consists of less than 50% of wheat.

#### **Exception.**

In those cases in which the material that passed through the 1/12" round-hole hand sieve consists of 50% or more of whole and/or broken kernels of wheat, the

Corn - 8/9/89 Rvd.  
Barley - 8/9/89 Rvd.  
Rye - 8/9/89 Rvd.

## Barley

### 1. Determining dockage with the Carter Dockage Tester.

- a. Set the air control at "Number 4".
- b. Set the feed control at Number 6.
- c. Use the Number 6 barley scalper riddle.
- d. Use the Number 8 sieve in the top sieve carriage.
- e. Use the Number 6 sieve in the middle sieve carriage.
- f. Use no sieve in the bottom sieve carriage.

In case the material which passed over the middle sieve contains mustard seed or wild buckwheat and/or similar sized seed, it shall be rescreened over the hand sieve (small buckwheat) having 5/64" (diameter of inscribed circle) equilateral triangular perforations. In this rescreening process, place the material on the sieve at the upper edge; then, holding the sieve at an angle of from 10 to 20 degrees, work the material down over the sieve by a gentle side-sieving motion. The barley and other material which remains on top of the hand sieve shall be returned to the cleaned sample and all of the material which remains on top of the hand sieve shall be returned to the cleaned sample and all of the material which passed through the hand sieve shall be considered as dockage.

## Rye

### Determining dockage with the Carter Dockage Tester.

#### 1. For all rye except that described in paragraphs 2 and 3 below.

- a. Set the air control at "Number 4".
- b. Set the feed control at Number 6.
- c. Use the Number 25 riddle.
- d. Use no sieve in the top sieve carriage, the Number 2 sieve in the middle sieve carriage, and the Number 2 sieve in the bottom sieve carriage except in those cases described below in paragraph (2).
- e. Examine the material which passed over the bottom sieve and if it consists of 50% or more of whole or broken kernels of rye, it shall be put back in the cleaned rye; otherwise it shall be added to the dockage.

The dockage will then consist of the material removed by the air, the material except rye that passed over the riddle, the material that passed over the bottom sieve, and the material that passed over the bottom sieve when such material consists of less than 50% of rye.

**Rye - 8/9/89 Rvd.**

- 2. For rye containing wild buckwheat and similar seeds.** If the rye (original sample) contains more than 0.5% of wild buckwheat and/or other weed seed of similar size and shape, use no sieve in the top sieve carriage, the Number 5 sieve in the middle sieve carriage, and the Number 2 sieve in the bottom sieve carriage.

The material which passed over the bottom sieve shall be rescreened over the hand sieve having 5/64" (diameter of inscribed circle) equilateral triangular perforations. In this rescreening process, not more than 50 grams of the material shall be placed on the sieve at the upper edge; then, holding the sieve at an angle of 10 to 20 degrees, work the material down over the sieve by a gentle, side-sieving motion. Repeat the operation on additional 50 gram portions until all the material has been rescreened.



## Rye - 2/1/60

All material which passed through the hand sieve in this operation shall be considered as dockage. (In some cases it may be necessary to repeat this hand-sieving operation with the material that passed through the hand sieve, but in no case should the material be rescreened more than twice.) After this operation, if the material remaining on top of the hand sieve consists of 50% or more of whole or broken kernels of rye, it shall be put back in the cleaned sample; otherwise it shall be added to the dockage.

The dockage will then consist of the material removed by the air, the material except rye that passed over the riddle, the material that passed through the bottom sieve, the material that passed through the hand sieve, and the material that remained on top of the hand sieve when such material consists of less than 50% of rye.

- 3. Rye containing flaxseed.** There are occasional samples of rye which contain flaxseed after the removal of dockage material by the methods previously described. In such cases the flaxseed shall be separated from the cleaned rye by the use of either a 3/64" by 3/8" perforated hand sieve or a 0.064" by 3/8" perforated hand sieve, according to which sieve is more in relation to the size of the rye and flaxseed kernels in the sample.

The flaxseed and other dockage material removed by this procedure shall be added to the dockage previously removed.

## Flaxseed

### 1. Determining dockage with the Carter Dockage Tester.

- a. Set the air control at "Number 4".
- b. Set the feed control at Number 4.
- c. Use the Number 000 riddle. If the Number 000 riddle should clog with wheat or kick whole flaxseed kernels over, use the Number 1 riddle.
- d. Use the Number 4 sieve in the top sieve carriage, the Number 2 sieve in the middle sieve carriage, and the Number 7 sieve in the bottom sieve carriage.
- e. Put the sample of flaxseed through the tester once.

The determination of dockage in flaxseed by this method requires three principal steps in procedure in the following order:

- a. A separation with the Carter Dockage Tester.
- b. A reclaiming of flaxseed with hand sieves, see item 3.
- c. A hand-picking of a portion of the mechanically cleaned flaxseed.

### 2. When lumps of flaxseed kick over with dockage. Matted lumps of flaxseed, caused by wet weather during harvest, usually clog the riddle or kick over with the coarse dockage.

When cases of this kind are encountered, remove the riddle and the top sieve (Number 4) from the Carter Dockage Tester and proceed to make the dockage determination as otherwise provided. In hand-picking a portion of the mechanically cleaned flaxseed to complete the dockage determination, the matted kernels of flaxseed, even though portions of flax bolls adhere to them, shall be considered as flaxseed.

### 3. Reclaiming flaxseed with hand sieves. Upon completion of the machine operation, examine the material that passed over the Number 4 sieve and if the material contains large-sized flaxseed, it shall be rescreened with a hand sieve having 0.064" by 3/8" perforations; if the material contains small-sized flaxseed, it shall be rescreened with hand sieve having 3/64" by 3/8" perforations; for the purpose of recovering the flaxseed passed over the Number 7 sieve contains considerable pigeon grass seed or mustard seed. When this occurs the material which passed over the Number 7 sieve shall be rescreened with a hand sieve having 3/64" by 3/8" perforations. The material remaining on top of this sieve shall be considered as dockage. The material which passed through the sieve shall be returned to the mechanically cleaned sample.

The mechanically separated dockage will then consist of the material removed by the air, the material removed by the riddle, the material removed by the Number 4 sieve except the reclaimed flaxseed, the material recovered by use of the 3/64" by 3/8" perforated hand sieve from the flaxseed which passed over the Number 7 sieve, and the material which passed through the bottom sieve.

4. **Flaxseed containing excessive amounts of pigeon grass seed and/or similar seeds.** If the flaxseed (mechanically cleaned sample) contains excessive amounts of pigeon grass seed and/or other weed seeds of similar size and shape, place about 250 grams of the sample on a hand sieve having 3/64" by 3/8" perforation, work the sample back and forth lengthwise of the perforations until all of the removable material has passed through the sieve. Repeat the operation until the entire sample has been sieved.
5. **Reclaiming flaxseed.** The flaxseed in the material that has remained on top of the 3/64" by 3/8" perforated hand sieve shall be reclaimed in the following manner. Use the hand sieve having 1/12" round-hole perforations (fine-seed sieve), hold the sieve at an angle of from 10 to 20 degrees, place the material on the lower edge of the sieve and strike the lower edge of the sieve with one hand in such a manner as to cause the material to bounce up and down. This will cause the pigeon grass, etc., to pass through the perforations of the sieve. Continue the operation until all of the separable dockage material has passed through the sieve. The material which remained on top of the 1/12" round-hole hand sieve shall be returned to the cleaned flaxseed. If the material which passed through this sieve consists of 50% or more of whole or broken kernels of flaxseed, it shall be put back in the cleaned flaxseed; otherwise it shall be added to the dockage.

The dockage removed by this procedure shall be added to the mechanically separated dockage previously removed.

6. **When lumps of flaxseed cannot be reclaimed.** At times the material that passes over the top sieve (Number 4) may contain lumps of flaxseed that cannot be recovered by rescreening with a hand sieve. In such cases all of the material that passed over the top sieve shall be put back in the otherwise mechanically cleaned flaxseed before proceeding to analyze that portion of the remainder of the dockage.
7. **Hand-picking mechanically cleaned flaxseed.** The mechanically cleaned flaxseed, including the flaxseed reclaimed by the hand sieve, shall be run through the Boerner divider, and a portion consisting of not less than 15 grams shall be obtained and analyzed (hand-picked) to determine the remaining dockage.

8. **Computing total dockage.** In computing the total actual dockage, all dockage obtained by the use of the machine and hand sieves, shall be computed on the basis of the sample as a whole. The percentage of dockage removed by hand-picking, determined on the basis of the weight in grams of the portion used for the hand separation, must be multiplied by the fractional proportion of flaxseed remaining after the removal of the mechanically separated dockage. For example, in a given sample the mechanically separated dockage amounts to 10%, thus the fractional proportion of flaxseed remaining after the removal of the mechanically separated dockage is 90%. The percentage of dockage found by hand-picking the 15 gram portion of mechanically cleaned flaxseed, for example 2%, shall be multiplied by 0.90, which gives 1.8% of dockage on the basis of the original sample. This, added to the 10% of dockage obtained by mechanical separation, gives a total actual dockage of 11.8% for the entire sample.

This procedure is illustrated by the following example:

Original sample - 1,000 grams. Mechanically removed dockage, 100 grams or 10%.

Original sample, 100%, less 10% is 90% (0.90) of original sample.

15 gram portion analyzed contained 0.3 gram dockage or 2%.

2% multiplied by 0.90 equals 1.8% of original sample.

10% mechanically obtained dockage plus 1.8% hand-picked dockage equals 11.8% total actual dockage (11% assessed dockage).

## Grain Sorghums

### 1. Determining dockage with the Carter Dockage Tester.

- a. Set the fan control off.
- b. Set the feed control at Number 6.
- c. Use no riddle.
- d. Use the Number 6 sieve in the top sieve carriage, no sieve in the middle sieve carriage, and the Number 1 sieve in the bottom sieve carriage.

**Broken Kernels** are defined as all material other than sorghum that passes through a Number 6 sieve and over Number 1 sieve.

**Foreign Material** is defined as all matter other than sorghum that passes over the Number 6 sieve and all matter other than sorghum that remains on top of the Number 1 sieve.

**Dockage** shall consist of the material that passes through the Number 1 bottom sieve.

2. **Computing cracked kernels, foreign material, and other grains.** In computing the total cracked kernels, foreign material, and other grains, the percentage of the material that is obtained by the use of the machine shall be computed on the basis of the dockage-free sample. The percentage of foreign material and other grains removed by hand-picking a portion of the machine-cleaned sample, which is computed on the basis of the weight in grams of the portion used for the hand separation, must be multiplied by the fractional proportion of grain sorghums remaining after the removal of the machine-separated cracked kernels, foreign material, and other grains. For example, in a given sample the machine-separated cracked kernels, foreign material, and other grains amount to 10%. Thus, the fraction of grain sorghums remaining after the removal of the machine-separated cracked kernels, foreign material, and other grains found in hand-picking the 30 gram portion of machine-cleaned grain sorghums (for example, 4% on a 30 gram base) should be multiplied by 0.90 which gives 3.6% of cracked kernels foreign material, and other grains on the basis of the dockage-free sample, and which should be added to the 10% of cracked kernels, foreign material, and other grains obtained by machine separation, thus giving the total actual cracked kernels, foreign material, and other grains for the entire dockage-free sample as 13.6%.



## Grain Sorghums - 12/2/52

This procedure is illustrated by the following example:

Original sample - 1,000 grams.

Dockage - 50 grams or 5% dockage.

Dockage-free sample - 950 grams.

Machine-separated cracked kernels, foreign material, and other grains - 95 grams, or 10% of 950 grams.

Dockage-free sample less 10% is 0.90 of the dockage-free sample.

30 grams analyzed give 1.2 grams foreign material and other grains, or 4% (30 gram base).

4% multiplied by 0.90 equals 3.6 of the dockage-free sample.

10% machine-separated cracked kernels, foreign material, and other grains plus 3.6% hand-picked foreign material and other grains equals 13.6% total actual cracked kernels, foreign material, and other grains.

**Equipment Schedule & Control Settings**

Kind of Grain	*Fan	Feed	Riddle	Sieves		
				Top	Middle	Bottom
Hard Red Spring Red Durum	975 RPM	6	#2		#2	#2
White	975 RPM	6	#2		#2	#2
Hard Red Winter Soft Red Winter	975 RPM	6	#2		#2	#2
Durum - White	975 RPM	6	#25		#2	#2
Rye	975 RPM	6	#25		#2	#2
Corn	Off	10		#3 / #20		
Barley	975 RPM	6	#6	#8	#6	
Flax	975 RPM	4	000	#4	#2	#7
Grain Sorghums	Off	6		#6		#1

\* Note: Fan speeds are not U.S.D.A. Standards.

See instructions for samples containing wild buckwheat, cob joints  
and chess, or other types of seeds.

See instruction for testing rice samples.

2-1-60

## Carter Dockage Tester Instructions for Rice

### 113. Removable Foreign Material (Dockage)

Removable foreign material (dockage) shall be all matter other than rough rice which can be removed readily from the rough rice by the use of appropriate sieves and cleaning devices, and underdeveloped, shriveled, and small pieces of kernels of rough rice removed in properly separating the foreign material, and which cannot be recovered by properly rescreening or recleaning.

**Basis of Determination.** When this determination is required, it shall be made on a representative portion of 1000 grams cut from the original sample.

**Method of Determination.** This determination shall be made with the use of the Carter Dockage Tester or with the use of any device and method which give equivalent results. When the Carter Dockage Tester is used, each sample shall be run through the machine twice, and the test shall be made in the following manner:

- A. Set the air control at Number 9.
- B. Adjust the feed so that the flow of rice will be such that practically all of the kernels will pass through the sieve in the top sieve carriage before they pass half-way over the sieve in use for the first run.
- C. On the first run:
  1. Use no riddle in the riddle carriage for any class.
  2.
    - a. Use the Number 28 sieve in the top sieve carriage for the classes Rexoro, Patna, Blue Bonnet, Nira, Fortuna, Zenith and Magnolia.
    - b. Use the Number 29 sieve in the top sieve carriage for the classes Blue Rose and Early Prolific.
    - c. Use the Number 31 sieve in the top sieve carriage for the classes Pearl and Calrose.
  3.
    - a. Use the Number 25 sieve in the middle sieve carriage for the classes Rexoro, Patna, Blue Bonnet, Nira, Fortuna, Zenith and Magnolia.
    - b. Use the Number 26 sieve in the middle sieve carriage for the class Pearl when the seeds to be removed are not seed of the varieties of **Echinochloa Crusgalli**, and for the classes Blue Rose and Early Prolific.
    - c. Use the Number 21 sieve in the middle sieve carriage for the class Pearl when the seeds to be removed are seeds of the varieties of **Echinochloa Crusgalli**.
    - d. Use the Number 27 sieve in the middle sieve carriage for the class Calrose.

4. a. Use the Number 22 sieve in the bottom sieve carriage for the classes Rexoro, Patna, and Blue Bonnet.
- b. Use the Number 4 sieve in the bottom sieve carriage for the class Pearl when the seeds to be removed are not seeds of the varieties of **Echinochloa Crusgalli**, and for the classes Nira, Fortuna, Blue Rose, Magnolia, Zenith and Early Prolific.
- c. Use no sieve in the bottom sieve carriage for classes Pearl when the seeds to be removed are seeds of the varieties of **Echinochloa Crusgalli**, and for the class Calrose.

D. On the second run:

1. a. Use the Number 000 riddle for all classes except the class pearl when the seeds to be removed are seeds of the varieties of **Echinochloa Crusgalli**.
- b. Use no riddle for the class Pearl when the seeds to be removed are seeds of the varieties of **Echinochloa Crusgalli**, and for the class Calrose.
2. a. Use no sieve in the top sieve carriage for any class except Pearl when the seeds to be removed are seeds of the varieties of **Echinochloa Crusgalli**, and except the class Calrose.
- b. Use the Number 27 sieve in the top sieve carriage for the class Calrose.
- c. Use the Number 30 sieve in the top sieve carriage for the class Pearl when the seeds to be removed are seeds of the varieties of **Echinochloa Crusgalli**.
3. a. Use the Number 5 sieve in the middle sieve carriage for the classes Rexoro and Patna.
- b. Use the Number 23 sieve in the middle sieve carriage for the classes Blue Bonnet, Magnolia and Zenith.
- c. Use the Number 24 sieve in the middle sieve carriage for the classes Nira Fortuna, Blue Rose and Early Prolific.
- d. Use the Number 25 sieve in the middle sieve carriage for the class Pearl when the seeds to be removed are not seeds of the varieties of **Echinochloa Crusgalli**.
- e. Use no sieve in the middle sieve carriage for the class Pearl when the seeds to be removed are seeds of the varieties of **Echinochloa Crusgalli**, and the class Calrose.

4. a. Use the Number 20 sieve in the bottom sieve carriage for all classes except Calrose and Pearl.
- b. Use the Number 21 sieve in the bottom sieve carriage for the class Pearl when the seeds to be removed are not seeds of the varieties of **Echinochloa Crusgalli**.
- c. Use no sieve in the bottom sieve carriage for the class Pearl when the seeds to be removed are seeds of the varieties of **Echinochloa Crusgalli**, and for the class Calrose.

In the case of the class Mixed Rough Rice, use the riddle and sieves that are prescribed above for the class of rice which predominates in the mixture.

In the case of a class of rough rice that is not specifically named above, use the riddle and sieves that are prescribed above for the class of rice the kernels of which are nearest in size and shape to those of the rough rice being analyzed.

The removable foreign material (dockage) will then consist of all material removed by the air blast, all material except rice that passed over the top sieve, all material that passed over the middle sieve, and all material that passed through the bottom sieve on the first run; and all material removed by the air blast, all material that passed over the middle sieve, all material that passed through the bottom sieve, and all material that passed over the bottom sieve when such material contains less than 50% of the whole or broken kernels of rice on the second run.



The following table is provided for ready reference regarding the riddle and sieves used in the Carter Dockage Tester for removing foreign material from rough rice.

	Rexoro Patna	Blue Bonnet	Nira Fortuna	Blue Rose Early Prolific	Magnolia Zenith	Calrose	Pearl	Pearl *
1st Run								
Riddle	--	--	--	--	--	--	--	--
Top Sieve	28	28	28	29	28	31	31	31
Middle Sieve	25	25	25	26	25	27	26	21
Bottom Sieve	22	22	4	4	4	--	4	--
Set air at Number 9 - Use rubber balls in lower sieve carriage.								
2nd Run								
Riddle	000	000	000	000	000	--	000	--
Top Sieve	--	--	--	--	--	27	--	30
Middle Sieve	5	23	24	24	23	--	25	--
Bottom Sieve	20	20	20	20	20	--	20	--
Set air at Number 9 - Use rubber balls in lower sieve carriage.								
* Sieves in this column are to be used when rough rice contains seeds of the varieties of <b>Echinochloa Crusgalli</b> .								

#### 114. Classes

Rough rice shall be divided into the following classes: Rexoro Rough Rice; Patna Rough Rice; Blue Bonnet Rough Rice; Nira Rough Rice; Fortuna Rough Rice, Blue Rose Rough Rice; Magnolia Rough Rice; Zenith Rough Rice; Calrose Rough Rice; Early Prolific Rough Rice; Pearl Rough Rice; and Mixed Rough Rice.

Except with respect to the class Mixed Rough Rice, each class shall contain more than 25.0% of whole kernels of rough rice of the designated class and may contain not more than 10.0% of rice of contrasting classes and the percentage of whole and broken kernels of a designated class in any lot of rice of such class shall exceed the percentage therein of kernels of any other class.

Mixed rough rice shall be any mixture of rough rice which contains more than 10.0% of rice of contrasting classes.

Rough rice that is not specifically classified shall be classified according to the commonly accepted commercial name of such rough rice.

The class Rexoro rough rice shall include the variety known as Rexoro; and the class Blue Rose rough rice shall include the varieties known as Improved Blue Rose, Greater Blue Rose, Calrose, and Arkrose.

**Basis of Determination.** This determination shall be made on the basis of the rough rice as whole. The classes of rough rice are based on kernel characteristics which include the color, texture, shape and length of the kernels. Knowledge of varietal characteristics is useful to the inspector in classifying rough rice. If it appears that an analysis is necessary to determine the class, it shall be made on a representative portion of not less than 25 grams cut from the original sample.

**508. Sieve Specifications and Descriptions.**

The following general standards have been adopted for the sieve metal used by rice inspection supervisors and are recommended for sieve metal used by rice inspectors:

- A. **Kind and Quality of Metal.** The sieve metal shall be aluminum and of a quality designated commercially as "half-hard", or harder. Aluminum of this hardness, by minimizing wear at the perforations, permits the maintenance of standard sieving conditions for longer periods of time than would be the case with softer metals.
- B. **Thickness of Metal.** The thickness of the aluminum sieve metal shall be 0.032" which corresponds to the Number 20 B&S gauge. The variation in thickness should not exceed the commercial tolerance of plus or minus 0.0015".
- C. **Accuracy of Perforations.** The diameter of round-hole perforations and of the inscribed circle of triangular perforations, and the width of slotted perforations shall meet the tolerance of plus or minus 0.001". The accuracy of perforations of sieves shall be checked by means of the "go" or "no go" cylindrical plugs.

**509. Riddle used in the Carter Dockage Tester for removing foreign material from rough rice.**

Identification Number	Name of Riddle	Type of Riddle	For Use to Remove
000	Flaxseed Riddle	Fabricated	Small Seeds, Broken Rice and Small Foreign Material

**510. Sieves used in the Carter Dockage Tester for Removing Foreign Material from Rice.**

Identification Number	Shape of Perforations	Common Designation	Decimal Equivalent of Diameter or Width
4	Oblong	4.125/64" x 3/8"	0.064
5	Slot	4.5/64" x 1/2 "	0.070
20	Round Hole	6/64"	0.094
21	Round Hole	7/64"	0.109
22	Slot	3-7/8 / 64" x 15/32"	0.061
23	Slot	4-7/8 / 64" x 3/4"	0.076
24	Slot	5/64" x 15/32"	0.078
25	Slot	6/64" x 15/32"	0.094
26	Slot	6-1/2/64" x 15/32"	0.102
27	Round Hole	6-1/2 /64"	0.102
28	Swaged Round Hole	9/64"	0.141
29	Swaged Round Hold	9-1/2 /64"	0.148
30	Swaged Round Hold	7/64"	0.109
31	Swaged Round Hole	10/64"	0.156

Perforations of each row shall be staggered with respect to perforations in adjacent rows.

**511. Hand Sieves used for making size separations of broken kernels of milled rice and removing broken kernels from head rice and brown rice.**

Description of Sieve				
Common Name of Sieve	Shape of Perforation	Size of Perforation		Approximate Number of Perforations Per Square Foot
		Common Designation	Decimal Equivalent of Diameter	
5-1/2 /64 Sieve	Round Hole	5-1/2 /64" Dia.	0.086	9,700
6 /64 Sieve	Round Hole	6 /64" Dia.	0.094	6,930
6-1/2 /64 Sieve	Round Hole	6-1/2 /64" Dia.	0.102	6,620

Perforations of each row shall be staggered with respect to perforations in adjacent rows.



**List of Possible Repair Parts**

<b>Part Number</b>	<b>Quantity per Machine</b>	<b>Name of Part</b>
<b><u>Parts Related to Aspirator</u></b>		
47937	1	Sheave, A3.4
20267	1	Sheave, V.P., 2.8" - 3.1"
47674	1	Sheave, A6.6
16970	1	Shaft for Control (Feed Valve Control)
48297	1	Shaft for Fan
19594	1	Shaft and Feed Roll
16965	1	Shaft for Screen Door
16889	1	Sprocket, 48 tooth, #35 chain, 1/2" bore (Feed Roll Shaft)
14607	4	Key 3/16" x 3/16" x 1-1/8" (Sheaves on Fan Shaft)
03605	1	Key 1/4" x 1/4" x 3"
16953	1	Screen Door
17007	1	Hopper for Feed
35655	1	Housing for Fan
441020	1	Pan for Aspirator (Air Liftings Pan)
410743	1	Gear, 20P, 60T, .75B
48274	1	Couplings, Shaft
19583	1	Valve for Feed
16898	1	Chain, #35, 3/8" pitch, 3/16" wide, 103 pitches long.
16918	1	Impeller for Fan
48286	1	V-belt, A-40
16896	2	Assembly Bearing for 1/2" diameter shaft Casting No. HC-2868 (Feed Roll Shaft)
19588	1	Assembly Lever (Feed Valve)
19589	1	Assembly Lever (Screen Door Shaft)
	1	Connecting Link #433 Diamond Chain (Air Valve Control Arms)
35667	2	Flanged Bearing, Snap in Nyliner

### Parts Related to Cam Shaft

16923	4	Cam (Casting No. HC-2853)
16916	1	Shaft for Cam
16888	1	Sprocket, 14 tooth, #35 chain, 15/15" bore
16885	1	Sprocket, 39 tooth, #35 chain, 15/16" bore
16902	2	Ball Bearing
63553	1	Chain #35
	5	Key Woodruff #11 (Cams and 39 tooth sprocket)
18792	4	Bearing, Flange, Fafnir No. 52M

### Parts Related to Crank Shaft

17134	1	Guard for Crank (Casting No. HC-2861)
17036	1	Sheave 8-1/8" OD, 3/4" bore (Casting No. HC-2869)
16884	1	Sprocket, 16 tooth, #35 chain, bore
10639	1	Key, 1/4" x 1/4" x 1.25"
441183	1	Rod for connecting (Rod End Bearings for Rocker Shaft)
441182	1	Nut, LH 7/16"-20
19609	1	V-belt, link type, Section A
441169	1	Crank Shaft
440683	1	Rod End with Needle Bearing
441181	1	Shoulder Bolt 1/4 -20 x .88

### Parts Related to Center and Lower Sieve

16894	4	Arm for Rocker (Casting No. HC-2828)
16909	4	Bracket for Rocker Shafts (Casting No. HC-2850 on End Plates)
16911	1	Hub for Rocker Lever (Casting No. HC-2852 Rocker Shaft)
18053	1	Support Magnet (Casting No. HC-22956 Center Sieve Box)
410514	1	Shaft for Rocker Arm
410615	1	Shaft for Rocker Arm (Drive Side)
410616	1	Stud for Rocker Lever
16947	1	Box for Sieve (Center)
16948	1	Box for Sieve (Lower)
16950	2	Spout for Sieve Box
18099	8	Compression Spring (Sieve Clamps)
18094	1	Magnet
16899	8	Rubber Lord Mounting

### Parts Related to Upper Sieve

16999	1	Rod for Sieve Stop
16927	1	Box for Sieve
16956	1	Spout for Sieve Box
17060	2	Rubber Bumper (Sieve Stop Rod)
16934	2	Tension Spring
410666	1	Nylon Sieve Slide - LH
410667	1	Nylon Sieve Slide - RH

### Parts Related to Riddle

17001	1	Clamp for Riddle (Casting No. HC-2859)
17002	1	Clamp for Riddle (Casting No. HC-2860)
16990	2	Rod for Riddle clamp
16908	1	Box for Riddle
17006	1	Spout for Riddle Box
17003	2	Knob for Riddle Clamp
16932	2	Tension Spring
17130	1	Stud for Hanger (Discharge End of Riddle Box)
17131	2	Stud for Hanger (Feed End of Riddle Box)
16993	1	Stop, Sieve

### Miscellaneous Parts

17141	1	Knob for Control (Feed Control) (Casting No. HC-2856)
16928	4	Support for Pan (Grain Pans) (Casting No. HC-2854)
36855	1	Sprocket, 24 tooth, #35 chain (Chain Tightener)
16936	5	Clamp for Pan (Grain Pans)
18284	1	Plate for Chain Tightener (With Stud)
15964	4	Rubber Bushing (For Cam Follower)
16890	8	Rubber Bushing (For Riddle Box and Upper Sieve Box Hanger Straps)
16893	2	Button for Spring (Riddle Box & Upper Sieve Box)
16969	1	Cam(Feed Valve)

00979	2	Set Collar, 3/8" ID, 15/16" OD, 3/8" wide
16937	4	Screw Eye (Riddle Box & Upper Sieve Box Springs)
13434	4	Tension Spring (Feed Valve, Screen Door & Upper Sieve)
16930	5	Torsion Spring (Grain Pan Clamp)
16931	5	Torsion Spring (Grain Pan Clamp)
16891	8	Strap for Hanger (Riddle Box & Upper Sieve Box)
17140	1	Thumbscrew, 5/16" - 18 x 2"(Bumper)
06967	2	Felt Washer (Rod End bearing)
17145	4	Rubber Washer (Air Control & Feed Control)
411985	5	Rod End Bearing (Rocker Shaft & Crank Shaft)
36855	1	Chain Tightener Sprocket w/Bearing
16901	4	Ball Bearing (Fan shaft & Crank Shaft)
17061	66	Bolt, Special Connecting Rod, 1/4" - 20 x 1-11/32"
16231	5	Bolt, Special Connecting Rod, 1/4" - 20 x 1-1/2"
10894	4	Bolt, Special Connecting Rod, 5/16" - 18 x 2-1/4"
440684	1	Electric Cord with Switch
17423	4	Rubber Strip (Feed Hopper & End Plate)
20358	1	Rubber Strip
17999	8	Bearing Flange Fafnir No. 47M (Fan Shaft & Crank Shaft)
441167	1	Motor, open ball bearing 56 cradle mount, 1/2HP,1725/1460 RPM
17070	58	Cap Nut, 1/4" - 20
09128	21	Cap Nut, 5./16" - 18
17159	1	Indicator Plate, Feed Control
17377	1	Indicator Plate
17137	1	Assembly, Bumper
19606	4	Assembly, Cam Follower
17189	4	Triangular Pan (Grain Sample) Key, Woodruff #7 (Rocker Shaft & 14 tooth sprocket)
36202	1	Level
48285	1	Shaft, Counter
440683	1	Rod End w/Needle Bearing

All other parts are available, such parts can best be supplied when we have the style number and the serial number of your machine and a reasonable description of the parts required.

# **Appendix A**

## **Parts List**

The following is a computer generated parts list for the Carter Dockage Tester.

IST.BOM.BY.BALLOON

Carter Day International

SLB for Part CD015729|01 Dwg #

Rev Lvl

Carter Dockage Tester

Carter Dockage Tester Consisting Of: A-31 V-Belt for 60 Hz

Drive Spout for Sieve Box Standard Carter Day Paint Machine

Effective as of 11-12-12

Ball Component  
Nbr Item Number

Drawing Number

Rv Component Item Desc  
Lv

Quantity UM  
Per Assy

13117 01	HC-33556	RIDDLE ASSY #6 BARLEY	1.000 EA
16943 01		V-BELT #A-31	1.000 EA
16956 01	HC-42190	SPOUT SIEVE BOX	1.000 EA
17026 01	CD-D6804	L SIEVE #7 4.5/64 RD	1.000 EA
17030 01	CD-D6804	L SIEVE #3 12/64 RD	1.000 EA
19545 01	HC-35352	RIDDLE ASSY #000 FLAX	1.000 EA
20936 01	HC-35789	RIDDLE ASSY #1 WHEAT	1.000 EA
20937 01	HC-35790	RIDDLE ASSY #25 WHEAT	1.000 EA
34904 01	CD-D6804	L SIEVE 9/64 RD	1.000 EA
440602 01	CD-D10662	00 STYXT7 TSTR DCKG W/ACOUS	1.000 EA
441167 01		MTR 1/2 56 1/50-60/115/2	1.000 EA
60721 01	CD-D6804	L SIEVE BLANK W/O PERFORATI	1.000 EA
98673 01		MANUAL INSTR	2.000 EA
C001 01		WIRE FOR 110 VOLTS	1.000 EA
MI-017 01		STD CARTERDAY BLUE PAINT	1.000 EA
W20329 01	CD-D3644	00 KIT BALL CLEANING DT	1.000 EA



LB

13:17 Thu Feb 08 2007

Carter Day International

Sys hpd210 Acct matth:

Single-Level Manufacturing Bills of Material - Effective as of 02-08-2007

Level/Item	Description	(Trap) Qty/Assy	UM	IT	Bal	Scrp	MPBTS	Rv	LT	RTG	ECO	ECO	Not
					Nbr	%	PHNPC	Lv	Off	Seq	Number	Date	Ref
440602 01	STYXT7 TSTR DCKG W/ACOUS		EA	1			M	A	00				
1.....	10894 01		EA	4			P	A	B				
	CONN BLT 5/16-18X2.25	4.000											
.....	13434 01		EA	4			P	A	D				
	SPR TNSN	4.000											
1.....	14607 01		EA	4			P	B	A	J			
	KEY SQ 3/16X3/16 X1.125	4.000											
.....	14750 01		EA	4			P	A					
	SHV A4.2 1G X.75B	1.000											
1.....	16231 01		EA	4			P	A	G				
	CONN BLT 1/4-20X1.5	5.000											
.....	16884 01		EA	2			M	A	05				
	SPRKT 35B16 .75B 2 SSCR	1.000											
1.....	16885 01		EA	4			P	A					
	SPRKT 35B39 .9375B 2 SSCR	1.000											
.....	16888 01		EA	4			P	A					
	SPRKT 35B14 .939B NO KWY	1.000											
1.....	16889 01		EA	4			P	A					
	SPRKT 35B48 .50B 2 SSCR	1.000											
.....	16890 01		EA	4			P	A					
	BSHG RBBR .25 ID X1.00 OD	8.000											
1.....	16891 01		EA	4			P	A					
	STRAP HGR	8.000											
.....	16893 01		EA	2			M	A					
	SPCR SV BOX	2.000											
1.....	16894 01		EA	2			M	A					
	ARM RKR CSTG HC2848	4.000											
.....	16896 01		EA	4			P	A	C				
	BRG FLG .50B URT DT	2.000											
.....	16899 01		EA	4			P	A					
	MT LORD #150 PD10	8.000											
1.....	16901 01		EA	4			P	A					
	BRG BALL .75B YAR204-012	4.000											
.....	16902 01		EA	4			P	A					
	BRG BALL .937B YAR205-015	2.000											
1.....	16908 01		EA	5			M	A					
	BOX RDL	1.000											
.....	16909 01		EA	2			M	A	B				
	BRKT RKR SFT DT	4.000											
1.....	16911 01		EA	2			M	A					
	HUB RKR LVR	1.000											
.....	16916 01		EA	2			M	A					
	SFT CAM 15/16D	1.000											
1.....	16918 01		EA	4			P	A					
	IMPELLOR FAN	1.000											
.....	16921 01		EA	2			M	A					
	FAN SFT 3/4 DIA	1.000											
1.....	16923 01		EA	4			P	A	D				
	CAM CSTG HC2853	4.000											
.....	16927 01		EA	2			M	A					
	BOX SV UPR	1.000											
1.....	16928 01		EA	2			M	A					
	SPRT PAN	4.000											
.....	16930 01		EA	4			P	A					
	SPR TRSN	5.000											
1.....	16931 01		EA	4			P	A					
	SPR TRSN	5.000											
.....	16932 01		EA	4			P	A	01				
	SPR TNSN	2.000											
1.....	16933 01		EA	2			M	A					
	STOP SV	1.000											
.....	16934 01		EA	4			P	A	00				
	SPR TRSN	2.000											
1.....	16936 01		EA	2			M	A					

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					Nbr	%	PHNPC	Lv	Off	Seq	Number	Date	Ref
440602 01	STYXT7 TSTR DCKG W/ACOUS		EA	1			M	A	00				
	PAN CLP	5.000											
16937 01	ROD END STL 1/4-20X1.75	4.000	EA	4			P	A	02				
16940 01	PL INR EXP CHMBR	1.000	EA	2			M	A					
16941 01	PL FR ASPRTR	1.000	EA	2			M	A					
16942 01	PL FR AIR DUCT	1.000	EA	2			M	A	B				
16944 01	SHV A2.8 1G X.75B	1.000	EA	4			P	A					
16945 01	PL BACK AIR DUCT	1.000	EA	2			M	A					
16947 01	BOX SV CTR	1.000	EA	5			M	A	13				
16948 01	BOX SV LWR	1.000	EA	5			M	A	09				
16950 01	SPT SV BOX	2.000	EA	2			M	A					
16952 01	PL LWR FR	1.000	EA	2			M	A					
16953 01	DR SCR N	1.000	EA	5			M	A					
16954 01	PL UPR FR	1.000	EA	2			M	A					
16955 01	HPPR SV BOX	1.000	EA	2			M	A					
16957 01	PL UPR BACK	1.000	EA	2			M	A	E				
16959 01	PL SPRT	1.000	EA	2			M	A					
16962 01	ANG CAM FOLLOWER SPRT	1.000	EA	2			M	A					
16963 01	BRKT CAM FOLLOWER	2.000	EA	2			M	A					
16965 01	SFT SCR N DR 3/8SQ	1.000	EA	2			M	A					
16966 01	VLV AIR	1.000	EA	5			M	A					
16969 01	CAM FD CONT	1.000	EA	2			M	A	02				
16970 01	SFT FD CONT 3/8D	2.000	EA	2			M	A	5				
16971 01	PL SV SPRT	1.000	EA	2			M	A	02				
16973 01	BRKT HPPR SPRT	1.000	EA	2			M	A					
16982 01	SPRT ASPRTR PAN	1.000	EA	2			M	A	D				
16983 01	SPR BTN	4.000	EA	2			M	A					
16988 01	PL MTR SPRT	1.000	EA	2			M	A	1				
16989 01	CLIP PAN CLP	2.000	EA	2			M	A	00				
16990 01	ROD RDL CLP 5/16D	2.000	EA	2			M	A					
16992 01	PL CAM FOLLOWER SPRT	2.000	EA	2			M	A					
16999 01	ROD SV STOP 5/16D	1.000	EA	5			M	A					
17001 01	CLP RDL	1.000	EA	2			M	A					

LB

13:17 Thu Feb 08 2007

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Single-Level Manufacturing Bills of Material - Effective as of 02-08-2007

Level/Item	Description	(Trap) Qty/Assy	UM	IT	Bal	Scrp	MPBTS	Rv	LT	RTG	ECO	ECO	Not
					Nbr	%	PHNPC	Lv	Off	Seq	Number	Date	Ref
440602 01	STYXT7 TSTR DCKG W/ACOUS		EA	1			M	A	00				
1.....	17002 01 CLP RDL	1.000	EA	2			M	A					
.....	17003 01 KNB RDL CLP	2.000	EA	2			M	A					
1.....	17004 01 BRKT CAM FOLLOWER	2.000	EA	2			M	A					
.....	17006 01 SPT RDL BOX	1.000	EA	2			M	A					
1.....	17007 01 HPPR FD	1.000	EA	2			M	A					
.....	17036 01 SHV A7.6 1G X.75B AC80	1.000	EA	4			P	A					
1.....	17061 01 CONN BLT 1/4-20X1.375	66.000	EA	4			P	A	G				
.....	17062 01 STUD BASE PAN STOP 5/16-1	2.000	EA	4			P	A					
1.....	17129 01 BRKT CAM FOLLOWER	2.000	EA	2			M	A					
.....	17130 01 STUD HGR 5/16-18 X2	2.000	EA	2			M	A					
1.....	17131 01 STRAP HGR 5/16-18 X1-3/4	2.000	EA	2			M	A					
.....	17135 01 STRAP BPR	1.000	EA	2			M	A					
1.....	17136 01 BPR RBBR	1.000	EA	2			M	A					
.....	17138 01 CHNL BRAKE	1.000	EA	2			M	A					
.....	17140 01 THUMB-SCR SPDH 5/16-18X2	1.000	EA	4			P	A					
1.....	17141 01 KNB CONT MACHINED	2.000	EA	2			M	A	E				
.....	17145 01 WSHR RBBR .375ID X.875 X.	9.000	EA	4			P	A					
1.....	17153 01 GROM RBBR .312ID X.625 OD	1.000	EA	4			P	A					
.....	17159 01 PL IND FD CONT	1.000	EA	4			P	A					
1.....	17160 01 PL IND AIR CONT	1.000	EA	4			P	A	00				
.....	17189 01 PAN TRIANGULAR FDRL GRAIN	5.000	EA	4			P	A					
1.....	17327 01 CLIP ELEC CD	1.000	EA	2			M	A					
.....	17377 01 PL IND RPM SP	1.000	EA	4			P	A					
1.....	17429 01 SHIM HANGAR STRAP	2.000	EA	2			M	A					
.....	17999 01 FLG BRG 3H #47MS FGT	8.000	EA	4			P	A					
1.....	18053 01 SPRT MAG	1.000	EA	2			M	A					
.....	18094 01 MAGNET	1.000	EA	4			P	A	A				
1.....	18099 01 SPR COMP	8.000	EA	4			P	A					
.....	18284 01 PL CH TGHTNR	1.000	EA	5			M	A					
1.....	18792 01 FLG BRG 3H #52MS FGT	4.000	EA	4			P	A	00				
.....	19001 01 PL OPERATING GD	1.000	EA	4			P	A					
1.....	19583 01		EA	5			M	A					



Single-Level Manufacturing Bills of Material - Effective as of 02-08-2007

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			Nbr	%	PHNPC	Lv	Off	Seq	Number	Date			Ref
440602 01	STYXT7 TSTR DCKG W/ACOUS		EA	1			M	A	00				
1.....	410950 01		EA	4			P	A	00				
	GD CRK VERSATHANE HC2861	1.000											
.....	411295 01		EA	2			M	A	00				
	CAM AIR CONT DT	1.000											
1.....	411296 01		EA	2			M	A	00				
	PVT AIR CONT DT	1.000											
.....	411298 01		EA	4			P	A					
	WSHR LTHR .25ID X.75 X.12	1.000											
1.....	411985 01		EA	4			P	A					
	BRG ROD END .4375B MBM7	5.000											
.....	412216 01		EA	2			M	A	A				
	STUD CAM FOLLOWER BRG DT	4.000											
1.....	412295 01		EA	5			M	A	-A				
	ARM IND WLDT DT	1.000											
.....	412729 01		EA	4			P	A					
	CARTON SHIPPING 43X31X56.	1.000											
1.....	414211 01		EA	4			P	A	A				
	NPL TRMRK CARTER DAY	2.000											
.....	414267 01		EA	4			P	A					
	PL IND ON/OFF	1.000											
1.....	423911 01		EA	2			M	A	A				
	PL SL DOCKAGE TSTR	1.000											
.....	431923 01		EA	4			P	A					
	CAPSCR SOC #10-32X.38 SS	4.000											
1.....	439975 01		EA	2			M	A	00				
	WLDT CSTR BASE DKG TSTR	1.000											
.....	439988 01		EA	4			P	A					
	LEG LVL 3/8-16X4.88	4.000											
.....	439992 01		EA	2			M	A	00				
	PL CVR FRONT DKG TSTR	1.000											
.....	439993 01		EA	2			M	A	00				
	PL CVR REAR DKG TSTR	1.000											
.....	439994 01		EA	2			M	A	C				
	PNL ACOUS FRT ACS DKG TST	1.000											
.....	439996 01		EA	2			M	A	00				
	PL MTG CVR FD INL DKG TST	1.000											
.....	439997 01		EA	2			M	A	00				
	COVER FEED INLET DKG TSTR	1.000											
.....	439998 01		FT	4			P	A					
	MAG STRIP 1/8X1/2 W/PSA	2.680											
.....	439999 01		EA	2			M	A	00				
	GD BELT ALUM DKG TSTR	1.000											
.....	440102 01		EA	4			P	A					
	SPRG TRSN CNTRY TO-5109RS	1.000											
.....	440103 01		EA	2			M	A					
	ROD 1/4D X 7.00 SS	1.000											
.....	440589 01		EA	4			P	A					
	NUT 3/8-16 W/ 5/8 HEX	4.000											
.....	440603 01		EA	4			P	A					
	HNG OFFSET LIFTOFF LH	1.000											
.....	440604 01		EA	4			P	A					
	HNG OFFSET LIFTOFF RH	1.000											
.....	440683 01		EA	4			P	A	00				
	BRG ROD NEEDLE 7/16-20 LH	1.000											
.....	440684 01		EA	4			P	A	00				
	CD ELEC W/SWTCH 110V 18LG	1.000											
.....	441020 01		EA	2			M	A	00				
	PAN DKG TSTR ASPIRATOR	1.000											
.....	441169 01		EA	2			M	A	00				
	SFT CRANK DKG TSTR XT7	1.000											
.....	441180 01		EA	0			MM	A	A				
	K ACOUSTICAL PNL DKG TSTR	1.000											
.....	441181 01		EA	4			P	A					



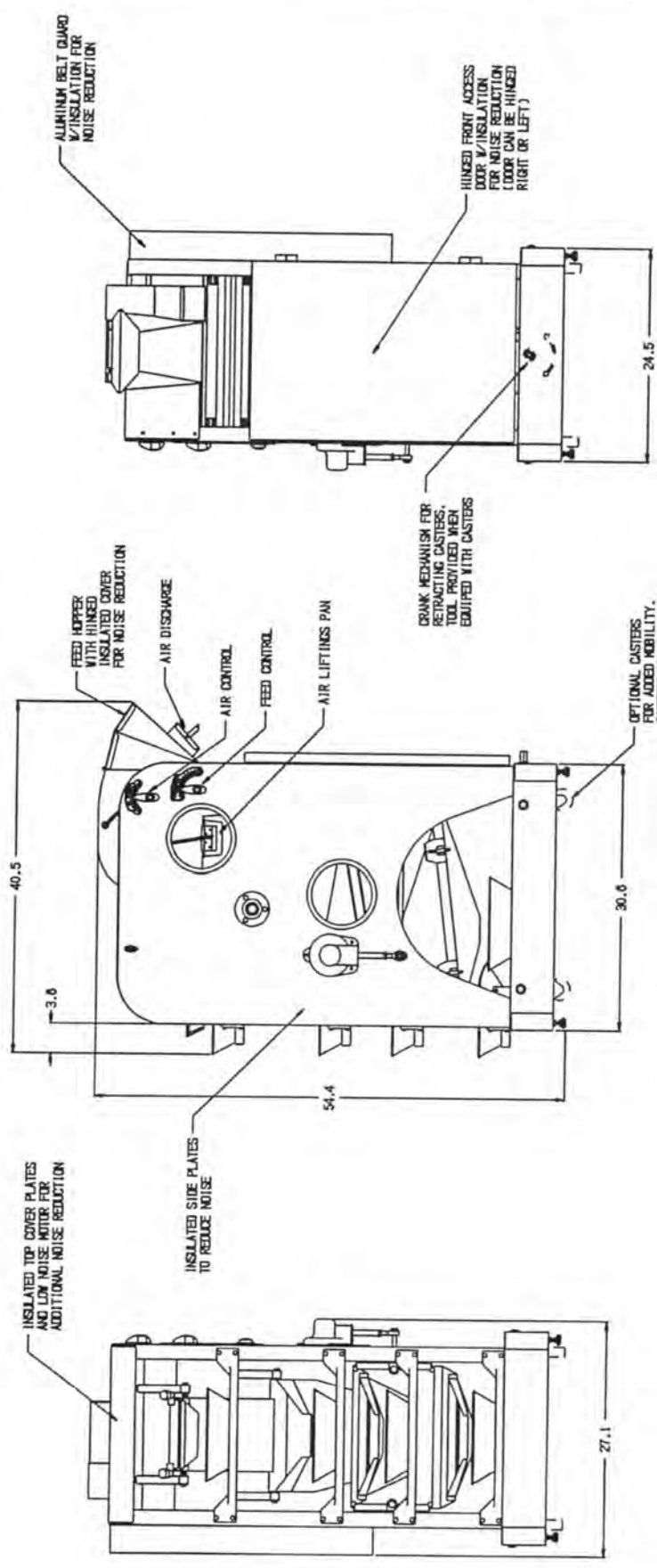


# Appendix B

## Drawings

Data Installation	CD-D10664
Assembly, Final	CD-D10662
Section Thru Shafting	CD-D10689
Section Thru Aspirator	CD-D739
Assembly, Lower Sieve Boxes	HC-50005
Assembly, Upper Sieve Box	HC-50270
Assembly, Riddle Box	HC-42856
Assembly, Caster (Optional)	CD-D10659

LINE	NO.	REV.	DATE	BY	CHKD.	DESCRIPTION



DATE	REV.	DATE	REV.	DESCRIPTION

**DESCRIPTION:** CARTER DAY DATA, INSTALLATION 31-7 CODAGE TESTER

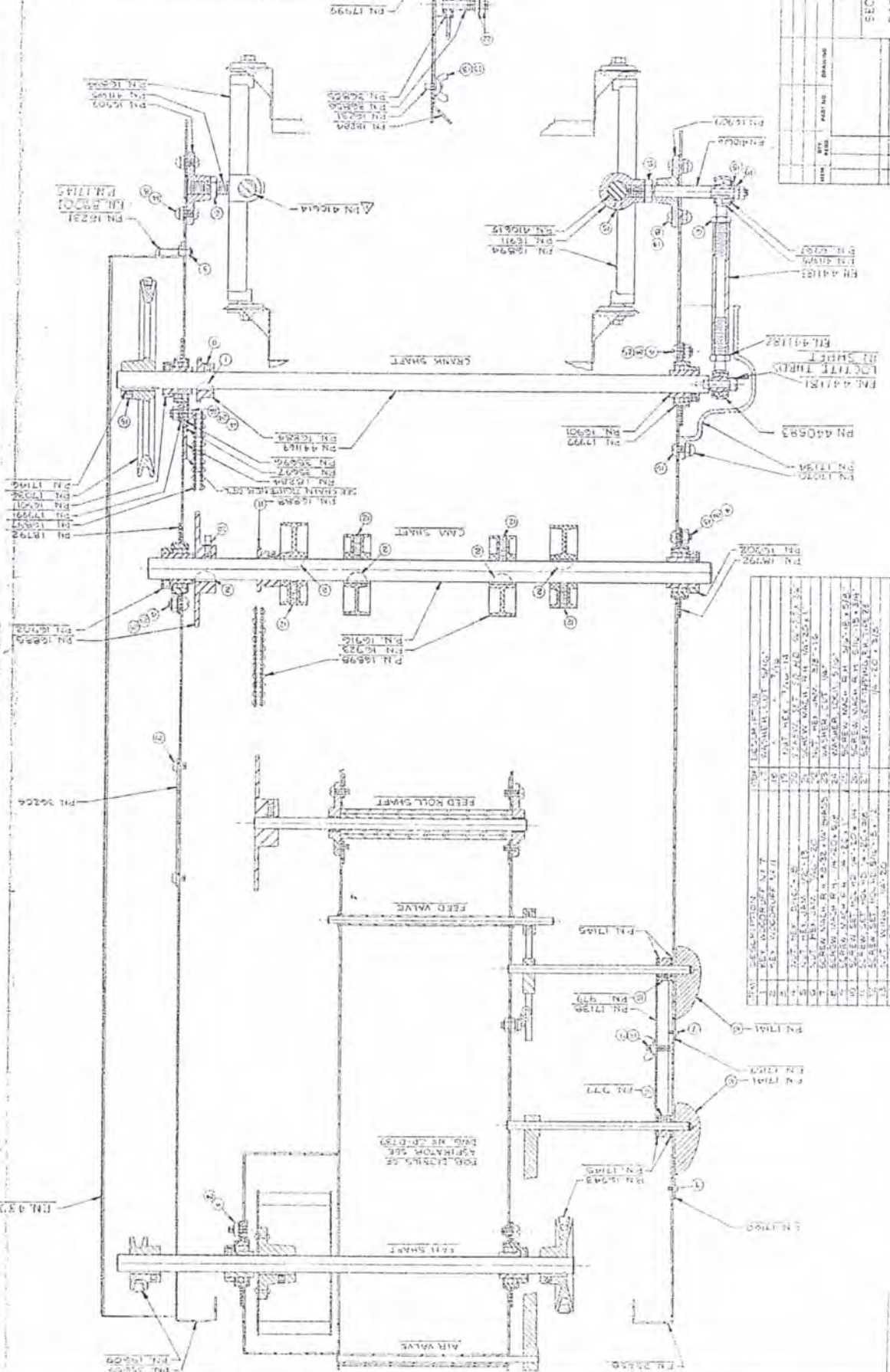
**REVISIONS:**

SCALE:	1:1
PROJECTION:	1ST ANGLE
UNIT:	MM





PART NO.	QTY.	DESCRIPTION
PN 17995	1	CRANK TIGHTENER ASSY
PN 17994	1	CRANK TIGHTENER ASSY
PN 17993	1	CRANK TIGHTENER ASSY
PN 17992	1	CRANK TIGHTENER ASSY
PN 17991	1	CRANK TIGHTENER ASSY
PN 17990	1	CRANK TIGHTENER ASSY
PN 17989	1	CRANK TIGHTENER ASSY
PN 17988	1	CRANK TIGHTENER ASSY
PN 17987	1	CRANK TIGHTENER ASSY
PN 17986	1	CRANK TIGHTENER ASSY
PN 17985	1	CRANK TIGHTENER ASSY
PN 17984	1	CRANK TIGHTENER ASSY
PN 17983	1	CRANK TIGHTENER ASSY
PN 17982	1	CRANK TIGHTENER ASSY
PN 17981	1	CRANK TIGHTENER ASSY
PN 17980	1	CRANK TIGHTENER ASSY
PN 17979	1	CRANK TIGHTENER ASSY
PN 17978	1	CRANK TIGHTENER ASSY
PN 17977	1	CRANK TIGHTENER ASSY
PN 17976	1	CRANK TIGHTENER ASSY
PN 17975	1	CRANK TIGHTENER ASSY
PN 17974	1	CRANK TIGHTENER ASSY
PN 17973	1	CRANK TIGHTENER ASSY
PN 17972	1	CRANK TIGHTENER ASSY
PN 17971	1	CRANK TIGHTENER ASSY
PN 17970	1	CRANK TIGHTENER ASSY
PN 17969	1	CRANK TIGHTENER ASSY
PN 17968	1	CRANK TIGHTENER ASSY
PN 17967	1	CRANK TIGHTENER ASSY
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PN 17962	1	CRANK TIGHTENER ASSY
PN 17961	1	CRANK TIGHTENER ASSY
PN 17960	1	CRANK TIGHTENER ASSY
PN 17959	1	CRANK TIGHTENER ASSY
PN 17958	1	CRANK TIGHTENER ASSY
PN 17957	1	CRANK TIGHTENER ASSY
PN 17956	1	CRANK TIGHTENER ASSY
PN 17955	1	CRANK TIGHTENER ASSY
PN 17954	1	CRANK TIGHTENER ASSY
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PN 17951	1	CRANK TIGHTENER ASSY
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PN 17941	1	CRANK TIGHTENER ASSY
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PN 17916	1	CRANK TIGHTENER ASSY
PN 17915	1	CRANK TIGHTENER ASSY
PN 17914	1	CRANK TIGHTENER ASSY
PN 17913	1	CRANK TIGHTENER ASSY
PN 17912	1	CRANK TIGHTENER ASSY
PN 17911	1	CRANK TIGHTENER ASSY
PN 17910	1	CRANK TIGHTENER ASSY
PN 17909	1	CRANK TIGHTENER ASSY
PN 17908	1	CRANK TIGHTENER ASSY
PN 17907	1	CRANK TIGHTENER ASSY
PN 17906	1	CRANK TIGHTENER ASSY
PN 17905	1	CRANK TIGHTENER ASSY
PN 17904	1	CRANK TIGHTENER ASSY
PN 17903	1	CRANK TIGHTENER ASSY
PN 17902	1	CRANK TIGHTENER ASSY
PN 17901	1	CRANK TIGHTENER ASSY
PN 17900	1	CRANK TIGHTENER ASSY



ITEM	DESCRIPTION	QTY.	UNIT
1	CRANK TIGHTENER ASSY	1	EA
2	CRANK TIGHTENER ASSY	1	EA
3	CRANK TIGHTENER ASSY	1	EA
4	CRANK TIGHTENER ASSY	1	EA
5	CRANK TIGHTENER ASSY	1	EA
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93	CRANK TIGHTENER ASSY	1	EA
94	CRANK TIGHTENER ASSY	1	EA
95	CRANK TIGHTENER ASSY	1	EA
96	CRANK TIGHTENER ASSY	1	EA
97	CRANK TIGHTENER ASSY	1	EA
98	CRANK TIGHTENER ASSY	1	EA
99	CRANK TIGHTENER ASSY	1	EA
100	CRANK TIGHTENER ASSY	1	EA

Carter-Day Company  
 DIVISION OF GENERAL MOTORS  
 SECTION: FUEL SHAFTEG  
 PACKAGE TESTER XT-7  
 PART NO. 17995  
 DATE: 12/1/54

REV.	DATE	DESCRIPTION
1		
2		
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29		
30		

PREPARED BY: [Name]  
 CHECKED BY: [Name]  
 APPROVED BY: [Name]

DATE: 12/1/54  
 SCALE: 1:1  
 SHEET NO. 1 OF 1

MANUFACTURED BY: [Name]  
 PART NO. 17995

DESCRIPTION: CRANK TIGHTENER ASSY

QUANTITY: 1
 UNIT: EA

REVISIONS:

REVISIONS:

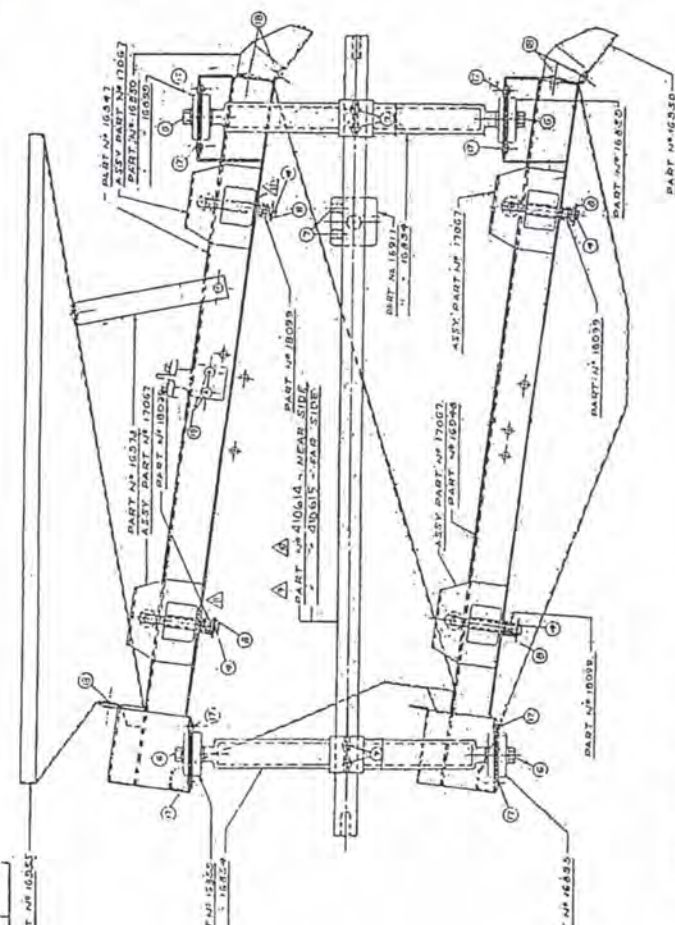
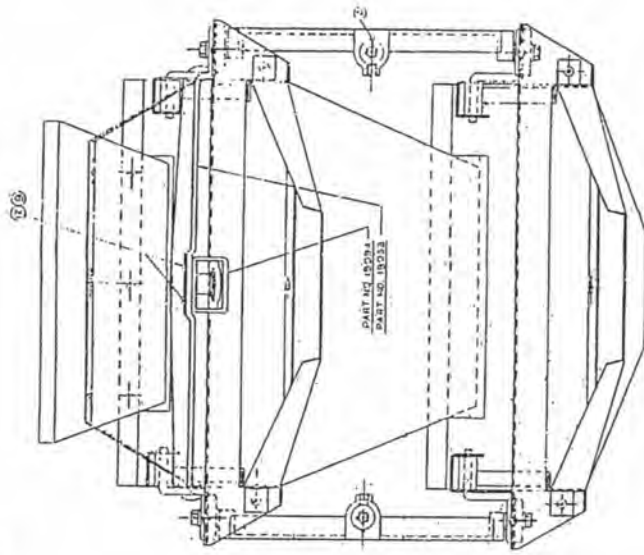
REVISIONS:





REV.	DATE	BY	CHKD.	DESCRIPTION
1				
2				
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REV.	DATE	BY	CHKD.	DESCRIPTION
1				
2				
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4				
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NOTE: WHEN ENTERING LEAD MOUNTING  
 ON 18235, THE SHORT END OF  
 THE CENTER TUBE SHOULD BE UP.

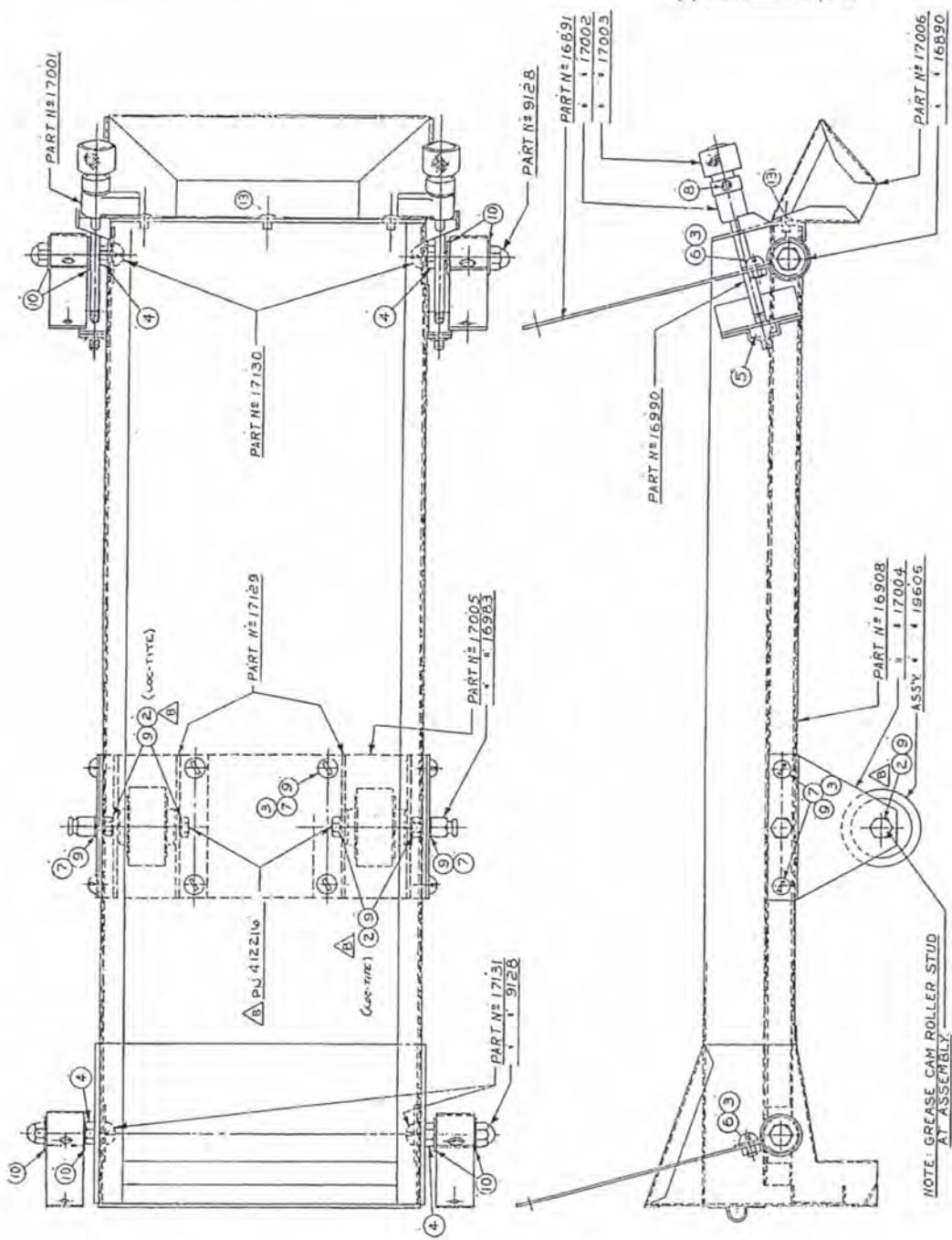
REV.	DATE	BY	CHKD.	DESCRIPTION
1				
2				
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7				
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HART-CARTER CO.  
 1000 W. 10th St., Chicago, Ill.  
 U.S.A.





16890	23009
16890	25392
16891	25393
16903	25397
16908	5936
16920	25399
17001	25403
17002	25403
17003	25404
17004	25405
17005	25406
17006	25407
17130	53425
17129	53425
17129	53426
15606	26028
11221	60-18299

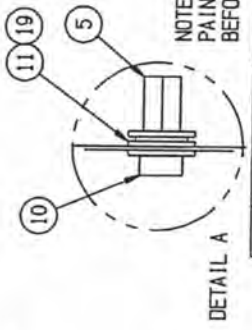
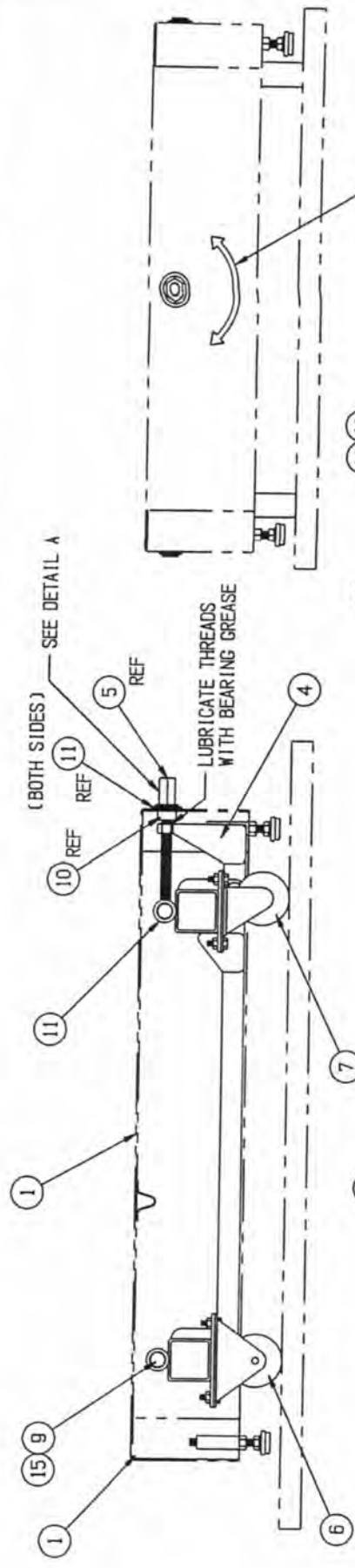


1	WASHER	1/2" x 1/4"
2	WASHER	1/2" x 1/4"
3	WASHER	1/2" x 1/4"
4	WASHER	1/2" x 1/4"
5	WASHER	1/2" x 1/4"
6	WASHER	1/2" x 1/4"
7	WASHER	1/2" x 1/4"
8	WASHER	1/2" x 1/4"
9	WASHER	1/2" x 1/4"
10	WASHER	1/2" x 1/4"
11	WASHER	1/2" x 1/4"
12	WASHER	1/2" x 1/4"
13	WASHER	1/2" x 1/4"

NOTE: GREASE CAM ROLLER STUD AT ASSEMBLY

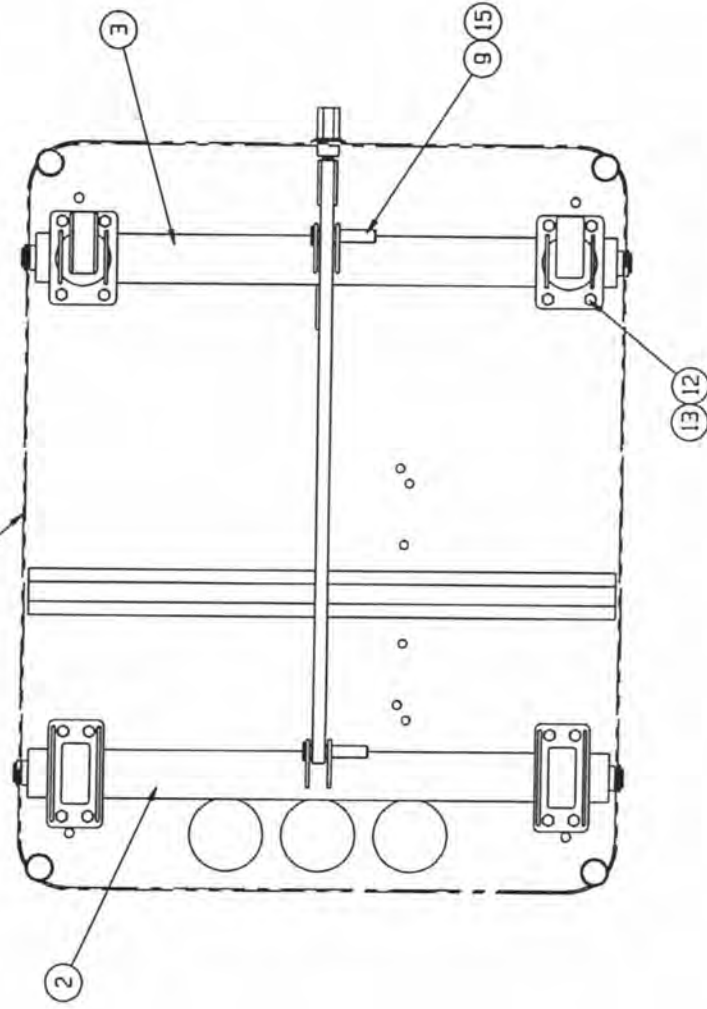
B 1/2" x 1/4" WASHER  
 B 1/2" x 1/4" WASHER  
 REV. 11-23-75. SEE OFFICE COPY  
 ASSEMBLY, RIDDLE BOX  
 HART-CARTER CO.  
 MINNEAPOLIS, MINN.  
 DRAWN BY: [Signature]  
 CHECKED BY: [Signature]  
 SCALE: HALF SIZE  
 41-42956

LEVEL	NO.	BY	DATE	REMARKS



NOTE:  
PAINT ALL FABRICATED PARTS CARTER DAY BLUE BEFORE ASSEMBLY. DO NOT PAINT ITEMS 17 & 18.

ITEM	QTY.	UNIT	PART NO.	DESCRIPTION
20	A/R	441178	NO	TAPE, 4955 WHITE, 1/2" WIDE
19	3	88362	NO	WASHER, FLAT, 1/2" ID
18	1	440587	NO	MAGNET
17	1	440588	NO	WRENCH 5-8 RACHET
16	1	36353	CD-A1440	DECAL, RADIAL ARROW
15	8	286795	NO	CUTTER KEY, 5/32 X 0.75
13	16	88470	NO	NUT, HEX, 1/4-20, NYLOC, G5
12	16	286146	NO	CAP SCREW, HEX HEAD, 1/4-20 X .75, G5
11	6	439987	NO	WASHER, FLAT, 1/2" NYLON
10	1	439986	NO	COLLAR, CLAMP-IN, THRO'D 1/2-10
9	6	439989	NO	PIN, CLEVIS, 1/2" DIA X 2.50 L6, MULTI-HOLE
7	2	439981	CD-7283	CASTER, SWIVEL, 2.00 DIA, 200 LB CAPACITY
6	2	439990	CD-7283	CASTER, RIGID, 2.00 DIA, 200 LB CAPACITY
5	1	439982	CD-A3480	SCREW, ADJUSTMENT, CASTER
4	1	439981	CD-010557	LINKAGE, CASTER TUBE
3	1	439977	CD-010556	TUBE, TORSION, SWIVEL, CASTER
2	1	439976	CD-010555	TUBE, TORSION, CASTER
1	1	439975	CD-010554	WELDMENT, BASE REF



NOTE:  
ATTACH MAGNET (ITEM 18) TO WRENCH (ITEM 17) USING TAPE (ITEM 20).

TOLERANCES UNLESS SPECIFIED	
DECIMAL: .XXX	+0.010"
	+0.02"
FRACTIONS: XX	+1/16"
	+1/2

CARTER DAY

KIT, CASTER, ADJUSTABLE

XT SERIES DOCKAGE TESTER

CD-010659