



Utilizing advanced imaging technology, the John Bean® V2280 provides accurate, real-time measurements - reducing setup and measurement times while generating serious productivity benefits. Matched with our latest software, the V2280 wheel aligner will have your technicians getting readings in a matter of minutes.

# 3D IMAGING WHEEL ALIGNMENT MACHINE

For passenger cars and light duty trucks

Small footprint, designed to do alignments fast and with the highest degree of precision.





### Snap-on Incorporated

### Who We Are

### **OUR MISSION**

The most valued productivity solutions in the world

#### **BELIEFS**

#### We deeply believe in:

Non-negotiable Product and Workplace Safety

Uncompromising Quality

Passionate Customer Care

Fearless Innovation

Rapid Continuous Improvement

#### **VALUES**

#### Our behaviors define our success:

We demonstrate Integrity.

We tell the Truth.

We respect the Individual.

We promote Teamwork.

We Listen.

#### VISION

#### To be acknowledged as the:

Brands of Choice

Employer of Choice

Franchisor of Choice

Business Partner of Choice

Investment of Choice







### **THINK BIG**



# SNAP-ON IS THE LARGEST AUTOMOTIVE EQUIPMENT MANUFACTURER IN THE WORLD

WE HELP MORE PEOPLE DAILY, WITH CRITICAL TASK SOLUTIONS WORLDWIDE, THAN ANY OTHER AUTOMOTIVE SERVICE EQUIPMENT COMPANY



### **OUR WORLDWIDE FOOTPRINT**



A division of Snap-on. Inc





### **OUR PARTNERS WORLDWIDE**







### WHO IS JOHN BEAN

John Bean is a division of Snap-on Incorporated, a leading global innovator, manufacturer and marketer of:

- IMAGING WHEEL ALIGNMENT EQUIPMENT
- WHEEL BALANCERS
- •TIRE CHANGERS
- ALIGNMENT RACKS

for professional users performing critical tasks

WHERE SECOND BEST IS NOT AN OPTION

### TIMELINE

In 1904 he founded the John Bean Spray Pump Company. When the company merged with a nearby food machinery company, it became the Food Machinery & Chemical Company (FMC).

John Bean engineers continued to innovate automotive service equipment and in 1934 introduced the first dynamic wheel balancer.

In 1947, John Bean launched the Visualiner which was the first optical wheel aligner in the world and quickly became the standard of the industry.

The FMC Visualiner II of series 9000 in 1984 marked the first successful application of optical measuring heads with a CRT computerized aligner.

In 1987 the John Bean Signature Series model 9909 became the first alignment machine with built-in training systems for the operator.

1996 Snap-on Corporation acquired the successful automotive equipment division from FMC and renamed it John Bean, honoring the original founder and visionary inventor, and the legacy continues......





#### THE BEST CUSTOMER EXPERIENCE THE INDUSTRY CAN OFFER

First wheel aligner
First dynamic wheel balancer
First computerized wheel aligner
First cordless measuring heads
First built-in operator video training
First use of color monitors
First use of CD-ROM

First use of animated color graphics
First pre-wired alignment lifts
First preventative maintenance programming
First use of 3D imaging technology for wheel aligners
First to use true 32 bit Windows alignment software
First wheel aligner with PRISM technology
First wheel aligner with live alignment error checking



### **FACTORY TRAINED SERVICE TECHNICIANS**

### **SNAP-ON EQUIPMENT**

A NEW STANDARD IN AUTOMOTIVE EQUIPMENT SERVICE

Snap-on Equipment has over 300 factory-trained service technicians nationwide with an average of 17 years of experience, representing the industry's largest repair & maintenance organization.

When you need installation, training or service, we'll have the right tools, genuine OEM replacement parts and the knowledge to satisfy your needs.

Your business is servicing automobiles. Keeping your equipment running smoothly and profitably is ours.



Highly skilled technicians equipped with the right tools and latest technology will ensure that repairs are done right, every time.



Equipment Service On-Site



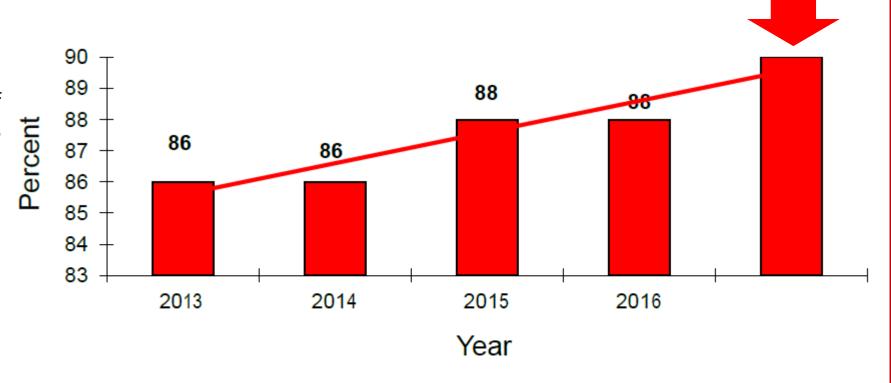
### **FAST AND DEPENDABLE SERVICE**

# SNAP-ON EQUIPMENT KEY PERFORMANCE INDICATOR

The most efficient service repair technicians in the industry

90% OF ALL SERVICE CALLS ARE COMPLETED WITHIN 48 HOURS

Our service technicians carry an array of repair parts on their trucks





### **FINANCING SERVICES**

### **SNAP-ON CREDIT**

WE UNDERSTAND THE AUTOMOTIVE BUSINESS

SNAP-ON CREDIT HAS
SEVERAL EQUIPMENT
PURCHASE PROGRAMS
AVAILABLE, DESIGNED
SPECIFICALLY FOR OUR
INDUSTRY, AND TO MEET
EVERY BUDGET.

Snap-on Credit is a world-class provider of innovative tools and equipment acquisition solutions to Snap-on and its customers on a global basis. What makes us so successful is our commitment to quality service.

Our dedication to your satisfaction begins with our support staff. In fact, no one else in the industry can give you the level of confidence you'll feel when working with Snap-on Credit.





### **BEST IN CLASS TRAINING**





### **OUR LEGACY**

Find prior art

Discuss th



A division of Snap-on. Inc

#### Patents

#### Method and apparatus for determining the alignment of motor vehicle wheels

US 5535522 A

the wheels of the vehicle.

#### **ABSTRACT**

An apparatus for determining the alignment of a motor vehicle's wheels and including targets (22L, 22R, 24L, 24R) which either form part of the wheels or are attached thereto, an optical sensing means such as a television camera (30) for viewing the targets, an electronic processing means (32) connected to the optical sensing means for processing the target images to determine wheel alignment, and a display means (34, 36) for displaying the alignment information. The optical sensing means (30) views a target located on each wheel and forms an image of each target. Electronic signals corresponding to each of the images are transferred to the electronic processing means (32) which correlates the perspective image of each of the targets with the true shape of each target. In so doing, the processor (32) relates the dimensions of

US5535522 A **Publication number** Publication type Grant

Application number US 08/122.550 PCT number PCT/US1993/008333

**Publication date** Jul 16, 1996 Filing date Sep 3, 1993 Priority date (?) Sep 4, 1992 Fee status (?) Paid

Also published as CA2143844A1, 7 More »

Inventors Bernie F. Jackson **Original Assignee** Jackson: Bernie F.

**Export Citation** BiBTeX. EndNote. RefMan

Patent Citations (3), Referenced by (146), Classifications (11), Legal Events (6)

External Links: USPTO, USPTO Assignment, Espacenet

certain known geometric elements (62, 63) of the target with the dimensions of corresponding elements in the perspective image and calculates the alignment of



### Snapen OUR COMPETITORS USE OUR TECHNOLOGY

JohnBean

A division of Snap-on. Inc

Publication number US5535522 A

Publication type Grant

Application number US 08/122,550

PCT number PCT/US1993/008333

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Original Assignee Jackson; Bernie F.

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Legal Events (6)

External Links: USPTO, USPTO Assignment, Espacenet



Publication number US5724743 A

Publication type Grant

Application number US 08/544,378

Publication date Mar 10, 1998

Filing date Oct 10, 1995

Priority date ? Sep 4, 1992

Fee status ?

Also published as CA2232534A1, 10 More »

Paid

Inventors Bernie Fergus Jackson

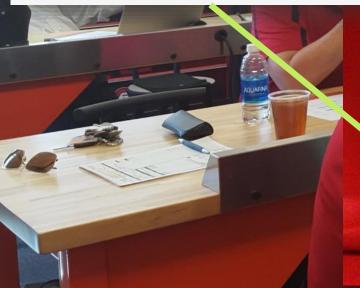
Original Assignee Snap-On Technologies, Inc.

Export Citation BiBTeX, EndNote, RefMan

Patent Citations (17), Referenced by (152), Classifications (10),

Legal Events (6)

External Links: USPTO, USPTO Assignment, Espacenet



5,388,057 5,675,515 6,064,927 9,298,284 6,754,562 7,043,396 5,488,471 5,724,128 6,134,792 6,427,346 6,796,036 7,100,286 5,513,439 5,774,361 6,178,356 6,442,460 6,799,376 7,136,728 5,528,496 5,870,315 6,219,734 6,498,959 6,917,417 7,289,020 5,553,389 5,937,365 6,252,973 6,556,904 7,000,326 7,382,913

THIS PRODUCT MAY BELICENSED UNDER U.S. PATENT NUMBERS:

5,535,522 5,724,743

ADDITIONAL U.S. & FOREIGN
PATENTS PENDING
24-158-2

HUNTER Engineering Company

Picture taken from the back of a Hunter Wheel Aligner





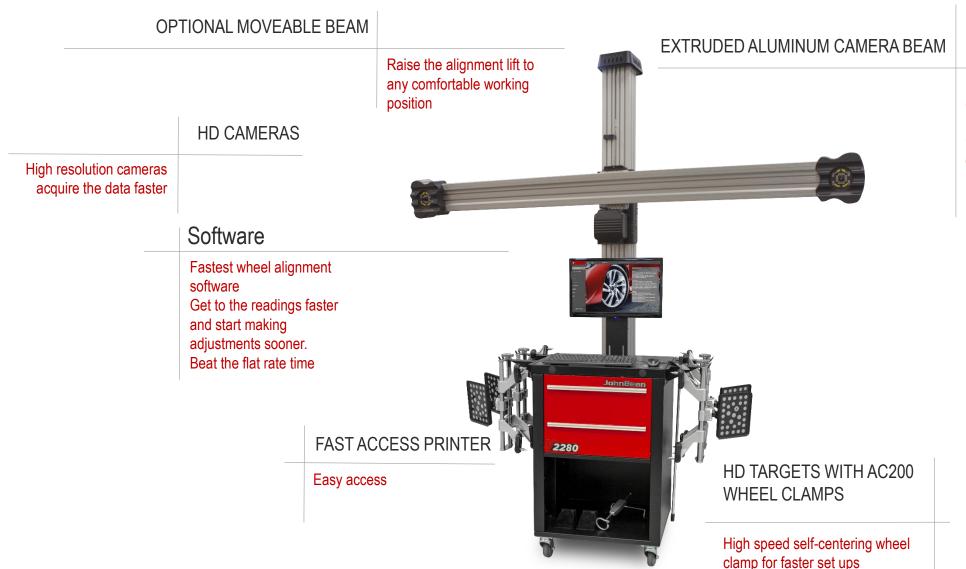
# DESIGNED FOR SHOPS THAT DO:

- SUSPENSION
- STEERING
- TIRE WORK

- Space smart footprint optimized | mounts close to the wall
- Integrated design | everything in one location
- Connected and informed | WiFi ready
- Compact and practical

#### **IMAGING WHEEL ALIGNMENT SYSTEM**





Rigid support for added consistency and precision, yet lightweight

Counterbalanced to minimize the load on the electric motor.

Provides smooth vertical motion

## SPEED and EASE of USE

Do more alignments faster and better without tying up too much shop real estate.



#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

Fast and easy to use



V3300
Three camera system
Portable
Mobile
Audit capable
For high volume and high
production shops



V1200
Break the space barrier
Portable
For smaller bays and low volume shops

#### **V2280**

- Two Camera System
- Movable beam option
- Passenger cars and light duty trucks up to one ton
- OEM standard production vehicles
- Short and extended wheelbase
- Four wheel alignment
- Thrust line alignment
- Two wheel alignment



#### **IMAGING WHEEL ALIGNMENT SYSTEM**



#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

Fast and easy to use



- Two Camera System
- Movable beam option
- Passenger cars and light duty trucks up-to one ton
- **OEM** standard production vehicles
- Short and extended wheelbase
- Four wheel alignment
- Thrust line alignment
- Two wheel alignment



### **V2280 Productivity Power Tools**

- EZ Toe
- Cradle Adjust
- Elevated adjustments
- A-arm adjustment
- Eccentric cams adjustment
- Slotted control arms adjustment
- Vehicle Dimensioning (basic)

#### **IMAGING WHEEL ALIGNMENT SYSTEM**

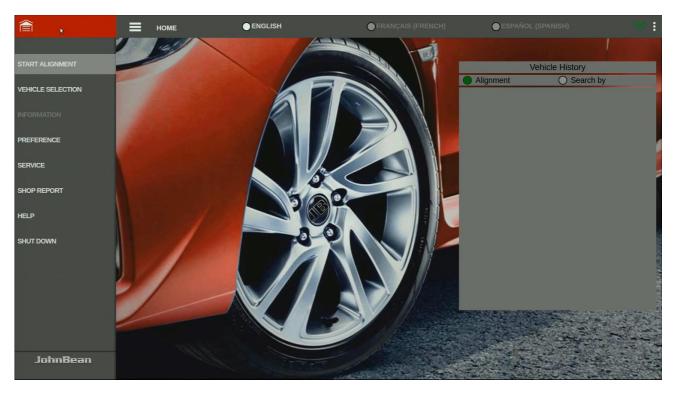


#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

Predictive Vehicle Selection





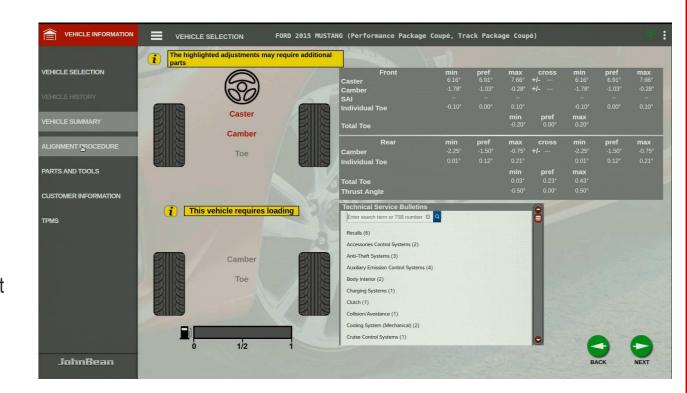


#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

Full Repair Support



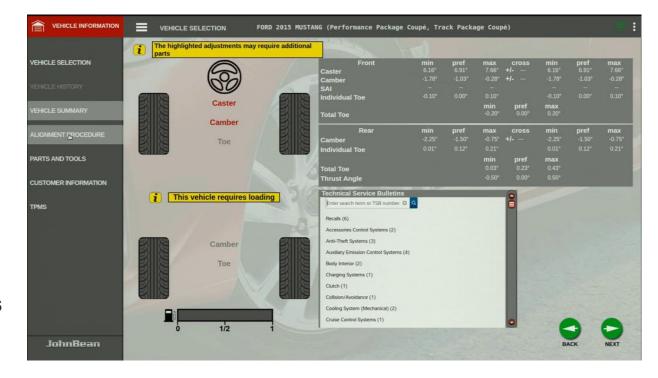




#### WHEEL ALIGNMENT EQUIPMENT

WIFI Connectivity





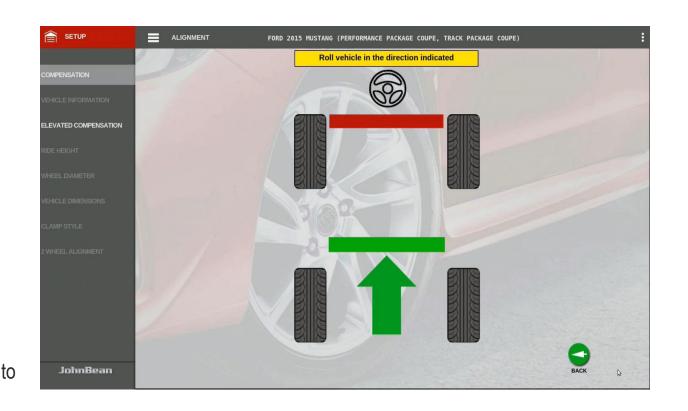


#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

**Fast Compensation** 





### **IMAGING WHEEL ALIGNMENT SYSTEM**

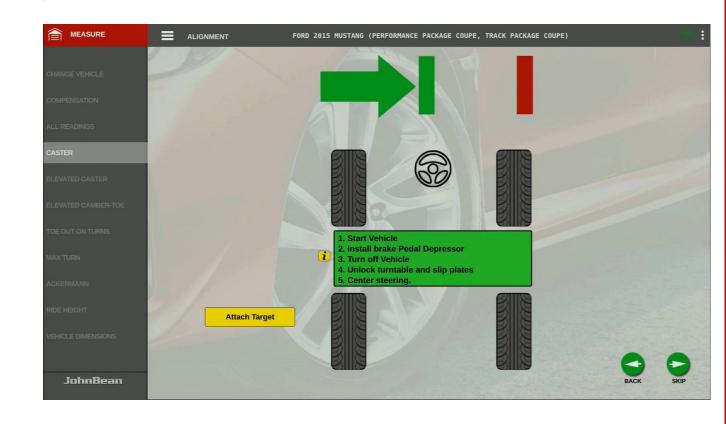


#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

**Fast Caster** 







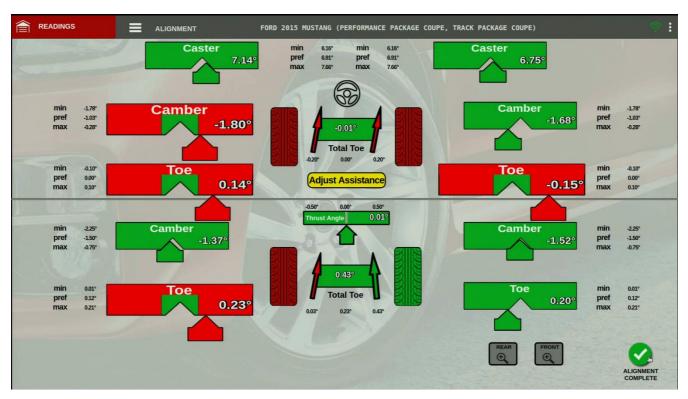
#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

All Readings



- Make all your adjustments
- Fast, easy, and convenient





#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

equipped vehicles

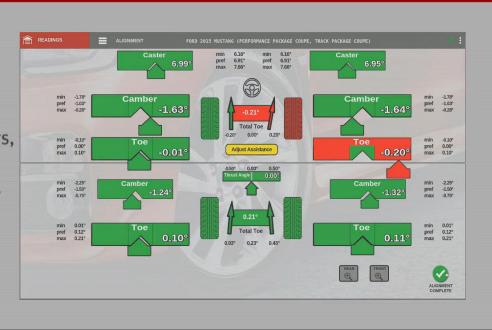
EZ Toe for straight steering wheels every time

John Beam Technical Training



After obtaining alignment readings, when ready to adjust Front Toe,

select EZ-Toe.



#### **IMAGING WHEEL ALIGNMENT SYSTEM**

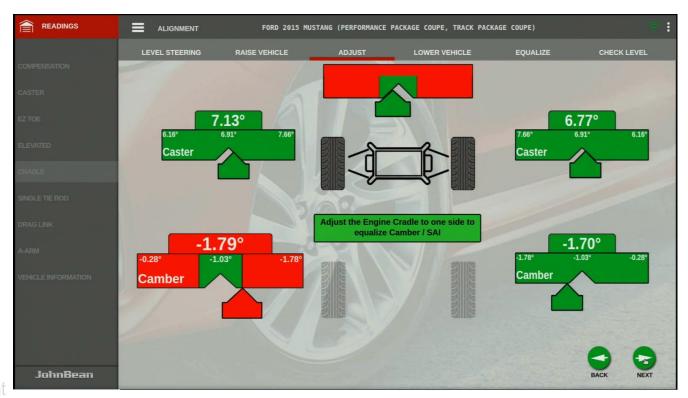


#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

Cradle adjust





Cradle adjustment is normally required after a transaxle replacement or repair, post front end collision work, or after hitting a curb.

#### **IMAGING WHEEL ALIGNMENT SYSTEM**

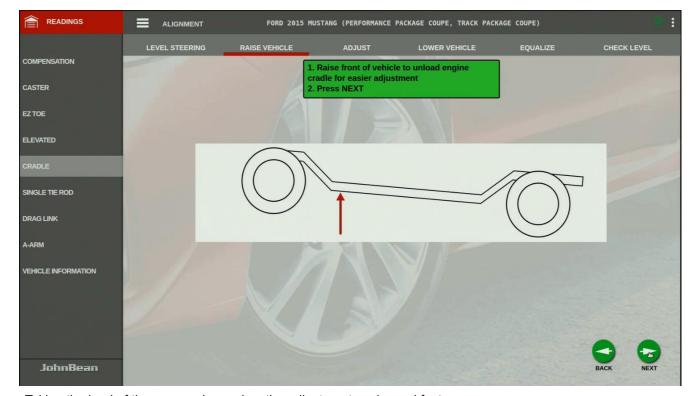


#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

Elevated adjustment





Taking the load of the suspension makes the adjustment easier and faster.

#### **IMAGING WHEEL ALIGNMENT SYSTEM**



#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

Shims, eccentric cams, slotted control arms



ALIGNMENT LEVEL STEERING RAISE VEHICLE LOWER VEHICLE **ADJUST LEFT** 6.76° UPPER CONTROL ARM -1.70° Camber O LOWER CONTROL ARM **JohnBean** 

Upper and or lower control arm shim, slots, or eccentric cam bolts.

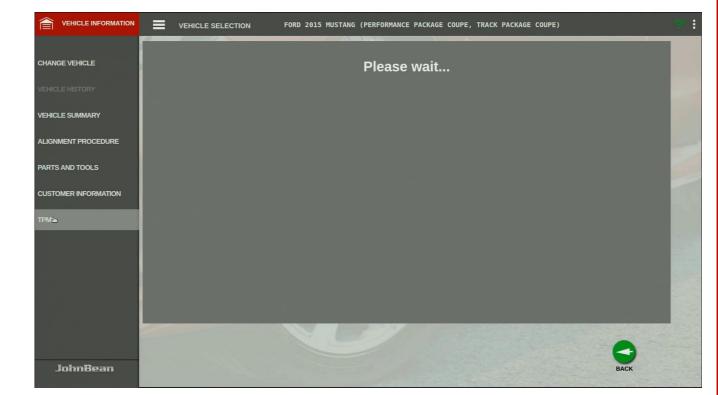


#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

**TPMS Information** 







#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

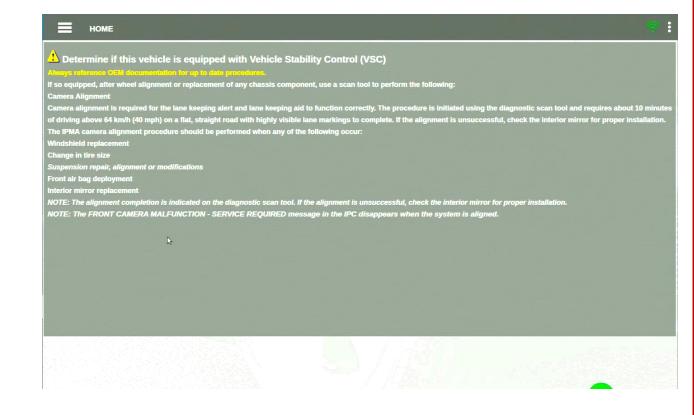
Vehicle Specific Sensor Reset Procedure





**SENSOR RESET PROCEDURES** 

- Deceleration sensor
- Acceleration sensor

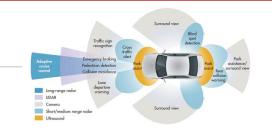






State-of-the art technology in an affordable package

ADAS





V2280
ADAS OEM
Procedures

- Advanced Driver Assist System adaptation procedures
- Here are a few examples of the immense coverage offered by JBC



#### **IMAGING WHEEL ALIGNMENT SYSTEM**



#### WHEEL ALIGNMENT EQUIPMENT

State-of-the art technology in an affordable package

**Customer information** 





Enter and save customer and vehicle information for your business. Back up and restore databases.



#### **AC200 CLAMPS**

Faster set up, wider range, positive clamping



AC200 wheel clamps are a legacy product. They provide a wide range of wheel size clamping.

The wheel claws are angled facilitating mounting on the wheel

The positive grip ensures that the targets will not move due to excessive vibrations when using pneumatic tools to loosen the adjustments



### **IMAGING WHEEL ALIGNMENT SYSTEM**



#### **AUTO-TRACKING MOVABLE BEAM**

Mechanically driven

Electromechanical, robust and reliable

Auto-tracking movement of the camera beam provides an enhanced range of operation from the ground all the way up to the highest position on the alignment rack

Set the vehicle at a comfortable working height of your choice



#### **IMAGING WHEEL ALIGNMENT SYSTEM**



#### **REPORTS**

Mechanically driven

Customer and technician friendly

#### SEVERAL REPORTS ARE AVAILABLE

#### **CUSTOMER FRIENDLY**

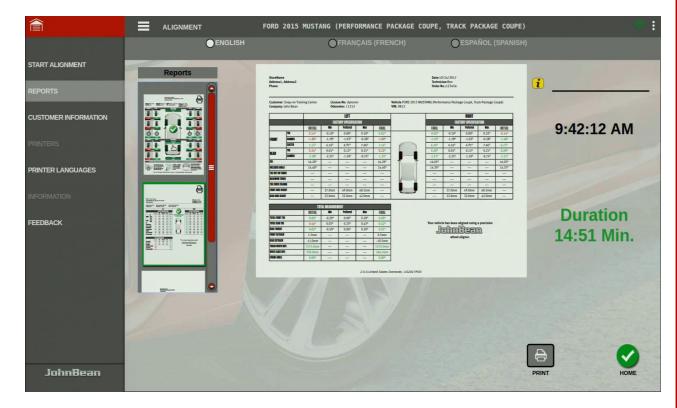
Before and after report

#### **TECHNICIAN REPORT**

With advance angles

#### VEHICLE DIMENSIONING REPORT

See the shape and determine if alignment alone can fix the vehicle



A primary and secondary report can be selected. The amount of time it took to perform the alignment is displayed on the screen (can be turned off).

#### **IMAGING WHEEL ALIGNMENT SYSTEM**



# IMAGING ALIGNER Error Reporting

A unique feature of the V2280 is it's ability to detect circumstances that would lead to a bad alignment

The three levels of error detection are:

#### **COMPENSATE**

**WARN** 

**ALERT** 



# IMAGING ALIGNER Error Reporting



The machine has detected a potential error and will compensate or make the necessary corrections

You will have a great alignment

### **COMPENSATE**

#### **IMAGING WHEEL ALIGNMENT SYSTEM**

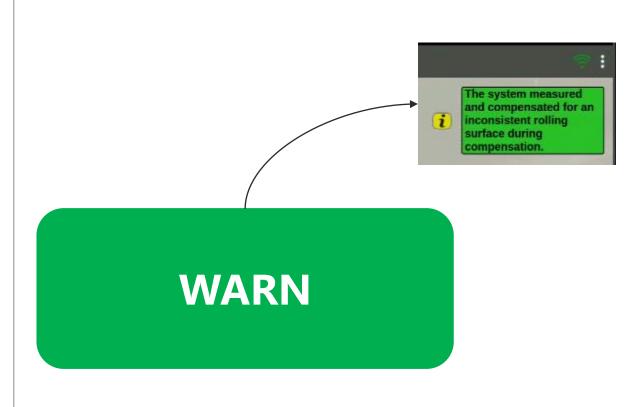


# IMAGING ALIGNER Error Reporting



The machine has detected a potential error and will compensate or make the necessary corrections and is advising you of the condition

You will have a great alignment

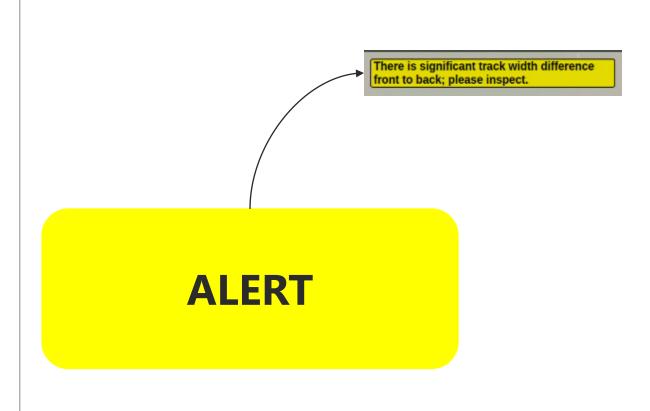




# IMAGING ALIGNER Error Reporting



The machine has detected a potential error and is informing you that this may not be your best alignment





## DO IT, AND DO IT WELL



# FIVE YEAR "PEACE OF MIND" WARRANTY

AVAILABLE ON JOHN BEAN WHEEL ALIGNMENT EQUIPMENT

#### OPERATE YOUR WHEEL ALIGNER WITH CONFIDENCE Extended Factory Warranty Current Specification Updates · Annual Optimizations and Precision Adjustments PLATINUM PACKAGE Five Years of Specifications Five Years of Software Upgrades and Enhancements (Three Updates per Year Installed by a Factory Trained Professional) Five Years of On-Site Service (Includes Parts & Labor) Five Annual Optimizations and Precision Adjustments **GOLD PACKAGE** Five Years of Specifications Five Years of Software Upgrades and Enhancements Three Years of On-Site Service (Includes Parts & Labor) SILVER PACKAGE Five Years of Specifications Five Years of Software Upgrades and Enhancements PRICE: \$0 DECLINED Standard Warranty Applies Customer Signature Date Customer (Print) Representative Signature Representative (Print)

Each is soldied to the original sales agreement. Important Credit Notice Peace he made that the manifoly payment and the sales of the s

JohnBean







#### **ORDER ONE TODAY!**