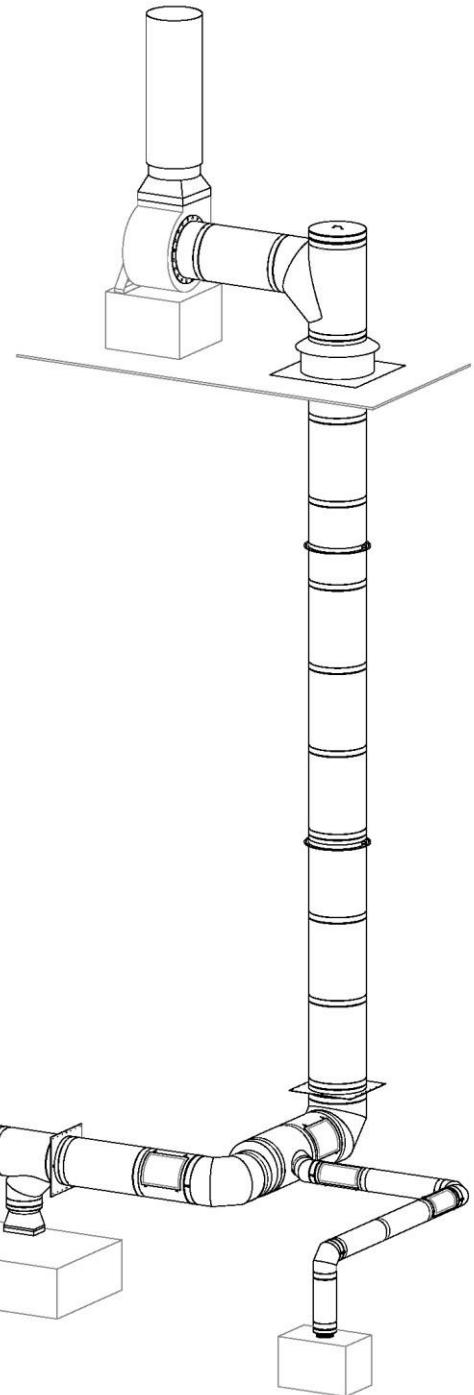


## Ductwork System Brochure

### Models:

- SW-NAKS-CK Single Wall
- DW-NAKS-CK-RC Double Wall  
(Reduced Clearance)
- DW-NAKS-CK-ZC Double  
Wall (Zero Clearance)



## INTRODUCTION

### NAKS, Inc

Models SW-NAKS-CK, DW-NAKS-CK-RC, and DW-NAKS-CK-ZC are factory built commercial exhaust systems for various types of cooking appliances. SW is Single Wall and DW are Double Wall Commercial Kitchen models. All Models may be intermixed in the same grease duct system.

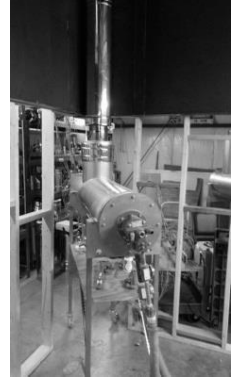
### Research and Development

In North America, NAKS, Inc employs only Underwriters' Laboratories (UL) for testing, certifications, and listings to all applicable UL and ULC Standards.

### All Stainless-Steel Construction



The all stainless-steel construction allows this product to be the ultimate selection for indoor or outdoor kitchen exhaust systems, it also accounts for a light weight solution that allows for the easiest installing system ever invented.



### Best Insulation

NAKS, Inc uses the new Superwool® Plus fiber blanket by Thermal Ceramics (Augusta, Georgia), which has improved handling strength and enhanced thermal properties. Superwool® Plus blanket is manufactured from pure raw materials using a new manufacturing technology. In addition to enhanced thermal properties, large nuisance dust particles have been effectively eliminated making the product soft to the touch and less irritating during use. Superwool® Plus blanket contains neither binder nor lubricant and does not emit any fumes or smell during the first high temperature firing.

NAKS, Inc compresses a 1½" blanket into a 1¼" area delivering better clearances and skin temperatures than other loose-fitting blanket insulated pipes. This also eliminates any chance of insulation settling during shipment and storage. See the installation clearance example using the same pipe I.D. as compared to other manufacturers. For example, NAKS Inc. Model DW-NAKS-CK-RC clearly is the industry leader in the smallest required footprint.

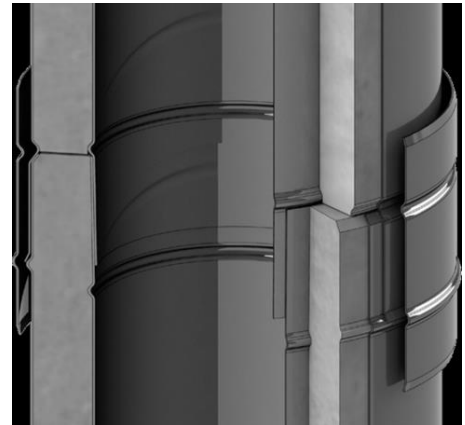


### Largest Joint Connection Surface Area / Easiest Install

Models SW-NAKS-CK, DW-NAKS-CK-RC, and DW-NAKS-CK-ZC incorporate a slip fit joint system with double female expansions for quick and easy assembly in the field. A NAKS supplied high temperature sealant is supplied for application at each joint to assure a full seal that will never leak

The double wall Model DW-NAKS-CK-RC is insulated with 1¼" thick compressed fiber insulation which allows the inner and outer pipes to stay aligned, without the use of additional clips or brackets. On other designs, clips or brackets act as a thermal bridge from the inner wall to outer jacket, so with no additional thermal bridge at the joint means there are no hot spots at pipe and fitting connections

All NAKS-CK models incorporate a 1" steel overlap at the joint and allows for the easiest assembly on the market. These are the only double female expanded joints with steel overlap on the market which allows for additional protection of the silicone seal against condensate and high-pressure washings in commercial kitchen exhaust.

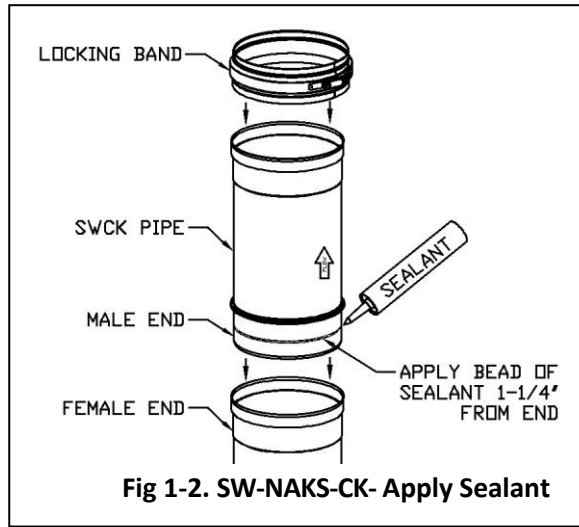


**Joint Assembly – Model NAKS-CK**

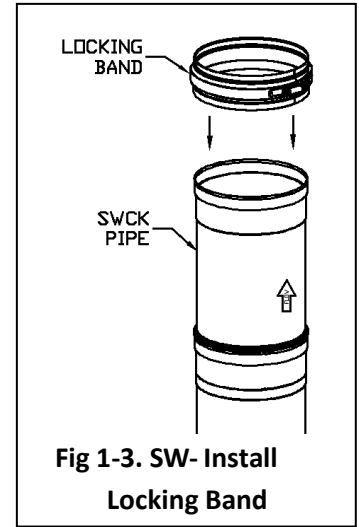
The Model NAKS-CK joint system is designed for a quick and easy installation. The procedure for DW Double-wall and SW single-wall are similar. See Figs 1-2 to 1-9.

To Assemble:

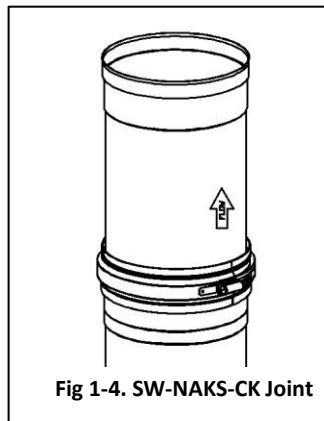
1. Clean / prepare the surfaces where sealant is to be applied.
2. Select correct sealant based on flue gas and application:
  - a. J-2000 Sealant for Flue Gas temperatures up to 2,000F. High temperature Heating system or Engine exhaust
  - b. J-600 Sealant for Flue Gas temperatures up to 600F. Low temperature heating system or Grease Duct.
3. Apply J- Sealant continuously (1/4" bead minimum) to the male end of the inner flue pipe. Sealant is to be approximately 1-1/4" from the end of pipe. (See Fig 1-2)
4. Position both pipes so they are in alignment. Engage the pipes and press them together until they completely engage by 2.2".
5. Position the Locking Band (LB) around the joint and ensure grooves in LB are seated in the Pipe grooves.
6. Secure LB, using 5/16" nut driver or flat-head screwdriver to tighten gear clamps



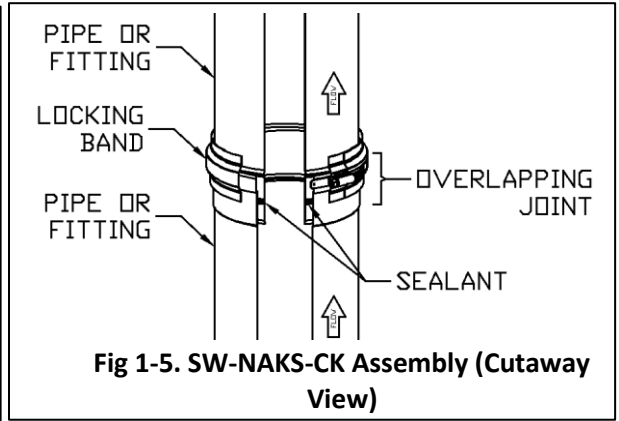
**Fig 1-2. SW-NAKS-CK- Apply Sealant**



**Fig 1-3. SW- Install Locking Band**



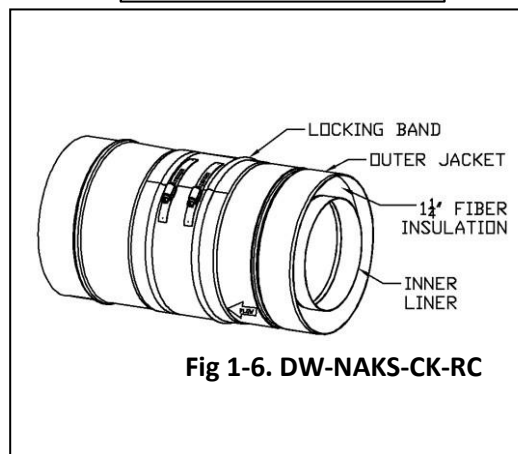
**Fig 1-4. SW-NAKS-CK Joint**



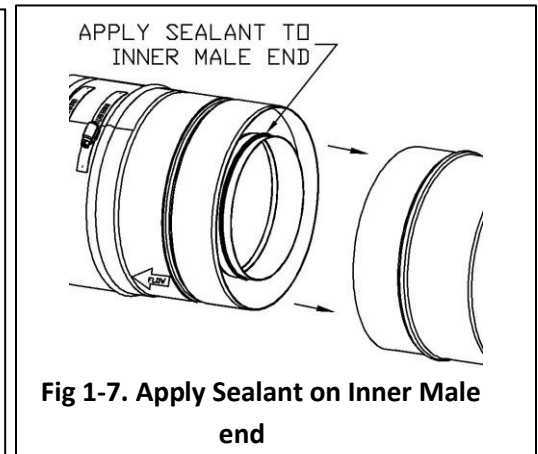
**Fig 1-5. SW-NAKS-CK Assembly (Cutaway View)**

Diameter	# of Joints
3" - 6"	10
8" - 10"	9
11" - 12"	8
13" - 16"	7
18" - 20"	6
22" - 24"	5
26" - 28"	4
30" - 32"	3
34" - 36"	2
38" - 48"	1

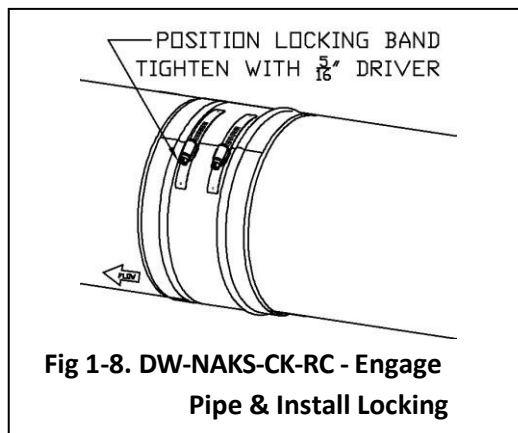
**Table 1-6. Sealant Usage**



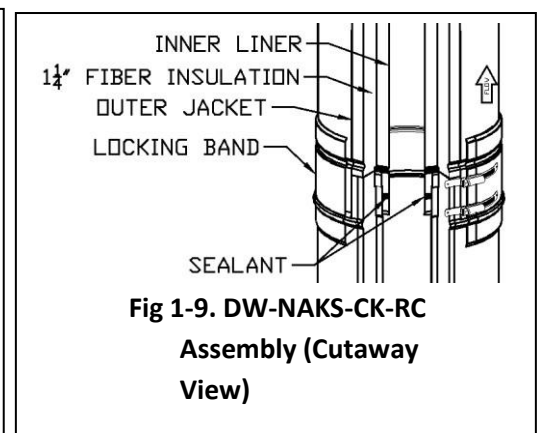
**Fig 1-6. DW-NAKS-CK-RC**



**Fig 1-7. Apply Sealant on Inner Male end**



**Fig 1-8. DW-NAKS-CK-RC - Engage Pipe & Install Locking**



**Fig 1-9. DW-NAKS-CK-RC Assembly (Cutaway View)**

**Installed Vent Length**

Due to the engagement of the vent sections, the effective installed length of any vent pipe or fitting is 2-3/16" less than the described length.

# Technical Data Sheet

## Single Wall Commercial Kitchen Exhaust

### SW-NAKS-CK

#### Product Line

SW-NAKS-CK – Single Wall Commercial Kitchen Exhaust Ductwork



#### Application

Stainless steel duct for connecting cooking appliances, kitchen hoods, and dishwasher exhausts to the outdoors under negative or positive pressure.

A true replacement for field welded black steel.

Design eliminates welding and lengthy inspections in the field, provides UL/ULC Listed and Certified exhaust solutions.



#### Purpose

Factory built eliminates welding in the field.

Easiest and Fastest joint assembly on the market using innovative and industry first technology. No V bands means faster and easier installations.

Due to the unique joint design, every pipe length can be cut-to-fit in the field, it is possible to do any project using only 48" long pipe lengths!

Assurance of finest quality and reliability.

Quick and easy inspections.

#### UL and ULC Listings

- UL-1978 Standard, Grease Duct (ULC-S662 Standard for Factory-Built Grease Ducts)
- UL-103 Standard, Building Heating Appliance Chimney
- Additional UL/ULC 20" W.C. Pressure Listing

#### Materials

- Made of all stainless steel, thickness per UL-1978 Listing
- All supports and accessories are stainless steel

#### Connection & Installation Details

2.2" overlapping joint with Patent-Pending light weight technology and double female socket permitting fastest alignment/installation on the market:

1. Use supplied silicone sealant to make the complete seal
2. Push the male/female ends together
3. Install the single-screw locking band

#### Features

- Only 1/16 inch per foot slope is required
- Factory CAD designs for installation ease
- All lengths are field cuttable for maximum flexibility
- 100% stainless steel with Limited Lifetime Warranty
- Overlapping high pressure joints
- Smooth flow and known resistance for perfected factory pressure calculations

# Technical Data Sheet

## Single Wall Commercial Kitchen Exhaust

### SW-NAKS-CK

Product Line

SW-NAKS-CK – Single Wall Commercial Kitchen Exhaust Ductwork



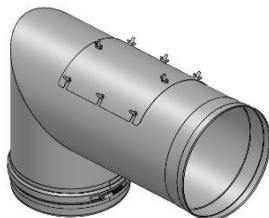
### Product Specifications

SW-NAKS-CK – Single Wall Commercial Kitchen Exhaust Ductwork

Diameters	6, 7, 8, 9, 10, 11, 12, 13, 14, 16, 18, 20, 22, 24, 26, 28, 30, 32, 34, & 36 (use SWFL for diameters 38" through 48")
Available Lengths	9", 12", 18", 24", 30", 36", 42", & 48" (or any fixed length between)
Available Fittings	Any elbow or tee, over 80 catalog fittings per each diameter
Available Accessories	All-stainless supports, guides, hangers, adapters – over 25 accessories per each diameter

### Smart Fittings & Accessories

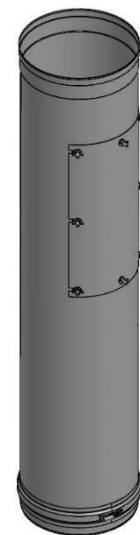
Besides the smart cut-to-fit technology, Jeremias uses smart fittings and accessories specifically designed for Grease Ducts; 87-degree elbow with built in access panel, 45-degree elbow with built in access panel, common wye with reduction branches, and no-weld hood connections.



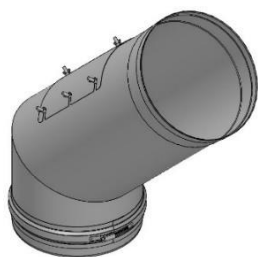
87-Degree Elbow with Access



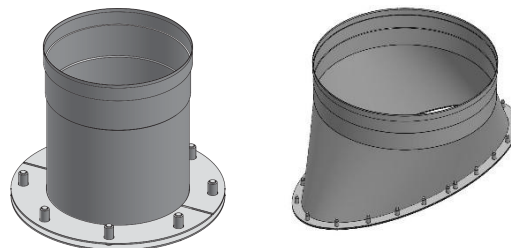
Increasing Bull Head Tee



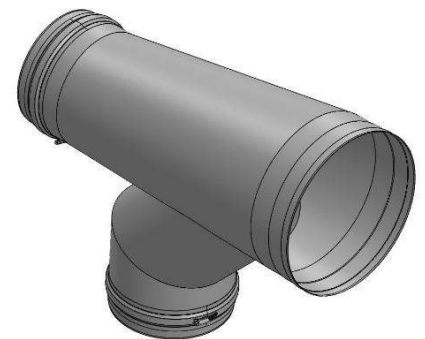
In Line Access Length



45-Degree Elbow with Access



No-Weld Hood Adapter  
Round provided for 12" and smaller. Oval provided for 14", 16" and 18"



Increasing Boot Tee

# Technical Data Sheet

## Double Wall Commercial Kitchen Exhaust

### DW-NAKS-CK-RC

Product Line

DW-NAKS-CK-RC – Double Wall Commercial Kitchen Exhaust



#### Application

Stainless steel duct for connecting cooking appliances and kitchen hoods to the outdoors under negative or positive pressure.

Design eliminates welding, second insulation trade, and lengthy inspections in the field, provides UL/ULC Listed and Certified exhaust solutions.



#### Purpose

Factory built eliminates welding and field applied insulation in the field.

Easiest and Fastest joint assembly on the market using innovative and industry first technology. No V bands means faster and easier installations.

Due to the unique joint design, every pipe length can be cut-to-fit in the field – it is possible to do any project using only 48" long pipe lengths! We do offer Cut Lengths with a clamshell outer jacket to make it easy on installers.

Quick and easy inspections.

#### UL and ULC Listings

- UL-1978 Standard, Grease Duct (ULC-S662 Standard for Factory-Built Grease Ducts)

#### Materials

- Made of all stainless steel (both inner and outer jacket), thickness per UL-1978 Listing
- 1.5" thick ceramic fiber insulation compressed into a 1.25" thick space
- All supports and accessories are stainless steel

#### Connection & Installation Details

2.2" overlapping joint with Patent-Pending light weight technology and a double female socket permitting fastest alignment/installation on the market:

- Use supplied silicone sealant to make the complete seal
- Push the male/female ends together
- Install the locking band to assure correct engagement

#### Features

- Only 1/16 inch per foot slope is required
- Factory CAD designs for installation ease
- All lengths are field cuttable for maximum flexibility
- 100% stainless steel with Limited Lifetime Warranty
- Smooth flow and known resistance for perfected factory pressure calculations



# Technical Data Sheet

## Double Wall Commercial Kitchen Exhaust

### DW-NAKS-CK-RC

Product Line

DW-NAKS-CK-RC – Double Wall Commercial Kitchen Exhaust



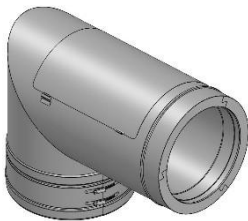
### Product Specifications

DW-NAKS-CK-RC – Double Wall Commercial Kitchen Exhaust Ductwork

Diameters	6, 7, 8, 9, 10, 11, 12, 13, 14, 16, 18, 20, 22, 24, 26, 28, 30, 32, 34, & 36 (use DWFL+1 for diameters 38" through 48")
Available Lengths	9", 12", 18", 24", 30", 36", 42", & 48" (or any fixed length between)
Available Fittings	Any elbow or tee, over 80 catalog fittings per each diameter
Available Accessories	All-stainless supports, guides, hangers, adapters – over 25 accessories per each diameter

### Smart Fittings & Accessories

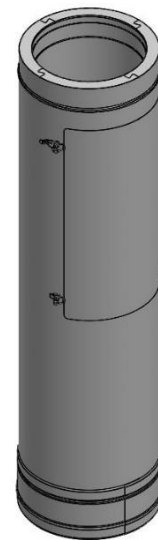
Besides the smart cut-to-fit technology, Jeremias uses smart fittings and accessories specifically designed for Grease Ducts; 87-degree elbow with built in access panel, 45-degree elbow with built in access panel, common wye with reduction branches, and no-weld hood connections.



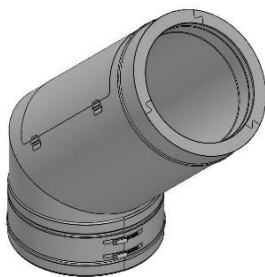
87-Degree Elbow with Access



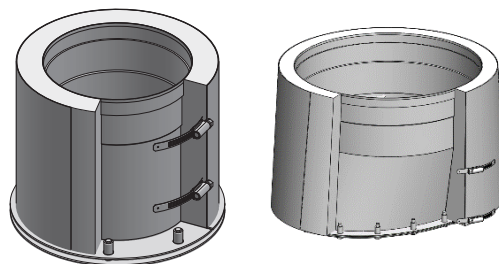
Increasing Bull Head Tee



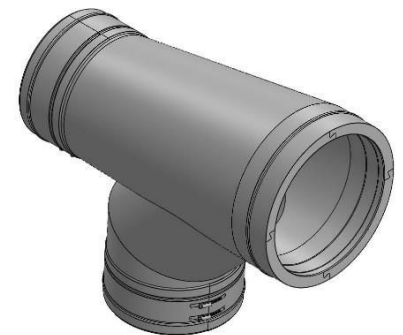
In Line Access Length



45-Degree Elbow with Access



No-Weld Hood Adapter  
Round provided for 12" and smaller. Oval provided for 14", 16" and 18"



Increasing Boot Tee

# Technical Data Sheet

## Double Wall Commercial Kitchen Exhaust

### DW-NAKS-CK-ZC

#### Product Line

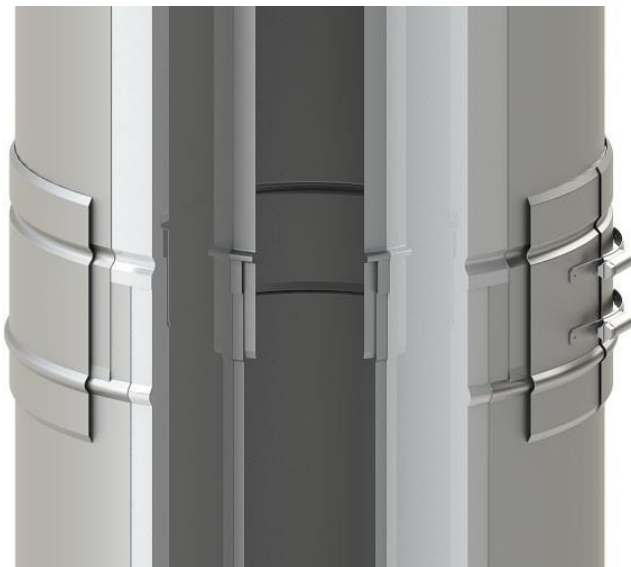
DW-NAKS-CK-ZC – Double Wall Commercial Kitchen Exhaust and 2-Hour Fire Resistance Shaft/Enclosure Assembly



#### Application

Stainless steel duct for connecting cooking appliances and kitchen hoods to the outdoors under negative or positive pressure.

Design eliminates welding, second insulation trade, third trade for a fire-rated shaft, plus all the lengthy inspections in the field. Provides UL/ULC Listed and Certified all-in-one exhaust solutions.



#### Purpose

Factory built eliminates welding, insulation, and building a fire rated shaft in the field.

Easiest and Fastest joint assembly on the market using innovative and industry first technology. No V bands means faster and easier installations.

Due to the unique joint design, every pipe length can be cut-to-fit in the field – it is possible to do any project using only 48" long pipe lengths! We do offer Cut Lengths with a clamshell outer jacket to make it easy on installers.

Quick and easy inspections.

#### UL and ULC Listings

- UL-1978 Standard, Grease Duct (ULC-S662 Standard for Factory-Built Grease Ducts)
- UL-2221 Standard, Fire Resistive Grease Duct Enclosure Assemblies
- Additional UL/ULC 20" W.C. Pressure Listing

#### Materials

- Made of all stainless steel (both inner and outer jacket), thickness per UL-1978 Listing
- 3.25" high density ceramic fiber insulation
- All supports and accessories are stainless steel

#### Connection & Installation Details

2.2" overlapping joint with Patent-Pending light weight technology and a double female socket permitting fastest alignment/installation on the market:

1. Use supplied silicone sealant to make the complete seal
2. Push the male/female ends together
3. Install the locking band to assure correct engagement

#### Features

- All-in-one grease duct and 2-hour fire rated shaft/enclosure assembly
- Only 1/16 inch per foot slope is required
- Factory CAD designs for installation ease
- All lengths are field cuttable for maximum flexibility
- 100% stainless steel with Limited Lifetime Warranty
- Smooth flow and known resistance for perfected factory pressure calculations



# Technical Data Sheet

## Double Wall Commercial Kitchen Exhaust

### DW-NAKS-CK-ZC

#### Product Line

DW-NAKS-CK-ZC – Double Wall Commercial Kitchen Exhaust and 2-Hour Fire Resistance Shaft/Enclosure Assembly



### Product Specifications

DW-NAKS-CK-ZC – Double Wall Commercial Kitchen Exhaust Ductwork and 2-Hour Fire Resistance Shaft/Enclosure Assembly

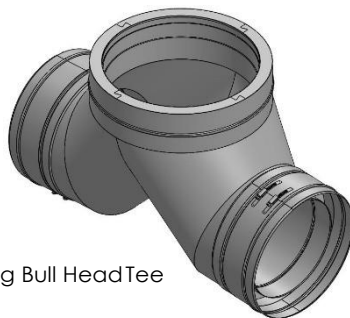
Diameters	6, 7, 8, 9, 10, 11, 12, 13, 14, 16, 18, 20, 22, 24, 26, 28, 30, 32, 34, & 36 (use Model DWFL-ZC for diameters 38" through 48")
Available Lengths	9", 12", 18", 24", 30", 36", 42", & 48" (or any fixed length between)
Available Fittings	Any elbow or tee, over 80 catalog fittings per each diameter
Available Accessories	All-stainless supports, guides, hangers, adapters – over 25 accessories per each diameter

### Smart Fittings & Accessories

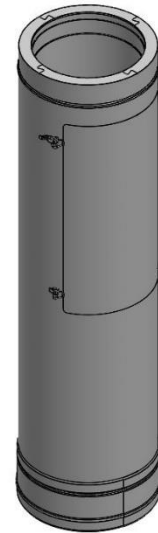
Besides the smart cut-to-fit technology, Jeremias uses smart fittings and accessories specifically designed for Grease Ducts; 87-degree elbow with built in access panel, 45-degree elbow with built in access panel, common wye with reduction branches, and no-weld hood connections.



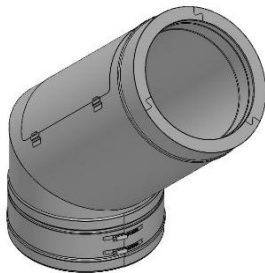
87-Degree Elbow with Access



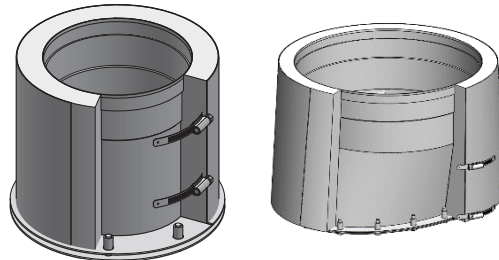
Increasing Bull Head Tee



In Line Access Length

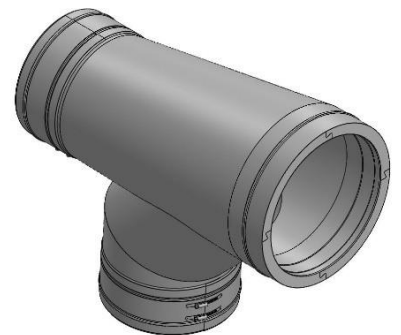


45-Degree Elbow with Access



No-Weld Hood Adapter

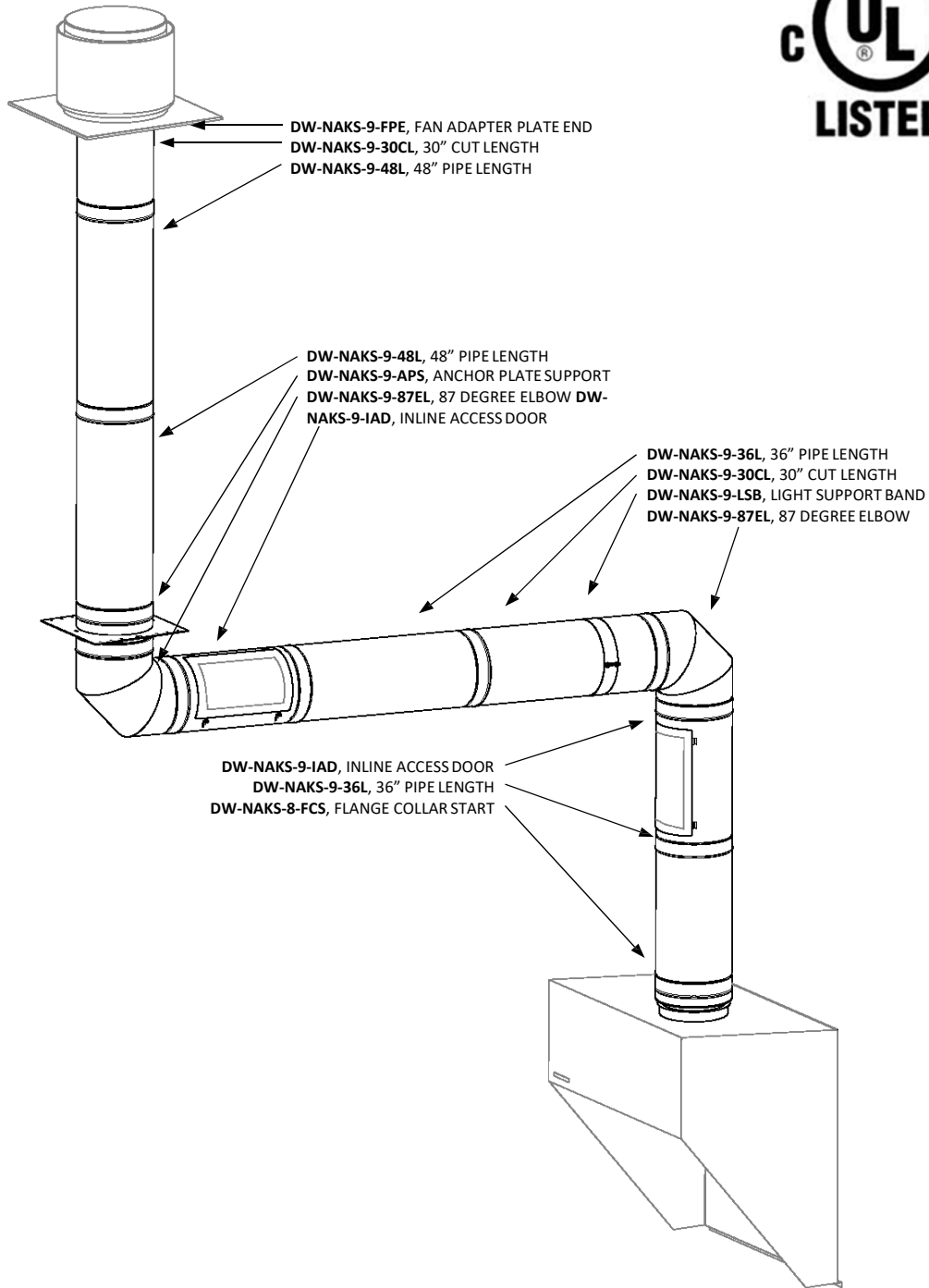
Round provided for 12" and smaller. Oval provided for 14", 16" and 18"



Increasing Boot Tee

# SAMPLE SYSTEMS

## STAND-ALONE RESTAURANT EXHAUST 9" I.D. Grease Duct from Wall Mounted Type I Hood



# SAMPLE SYSTEMS

COMMERCIAL GREASE DUCT  
 2X 14", INTO 20", 1X 8", INTO COMMON 24" GREASE DUCT

