

JDSI ASPHALT SHINGLE ROOFING PRESENTATION



- Tips, Tricks, Hints, and Information for windstorm roofing.
- Prepared by Lead Inspector, JDSI, 281-798-3423
- This presentation is to serve as a tool to assist in knowledge and roof installation. It should not be used as a definitive reference, is not guaranteed to be accurate or up to date and is subject to change at any time. Please contact JDSI with any questions regarding this presentation.



OBJECTIVES



JDSI Roofing Picture Examples

Key Terms

Before You Start a Job

Installation Information

After Installation

Roofing Picture Examples

Key Terms

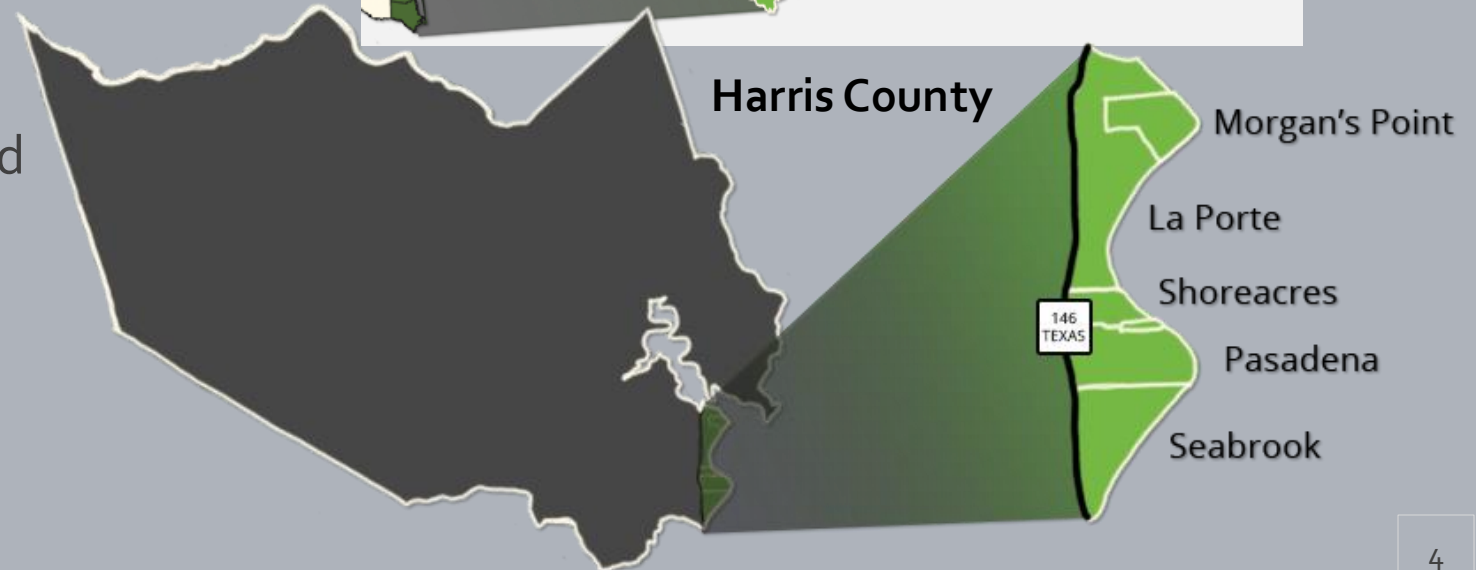
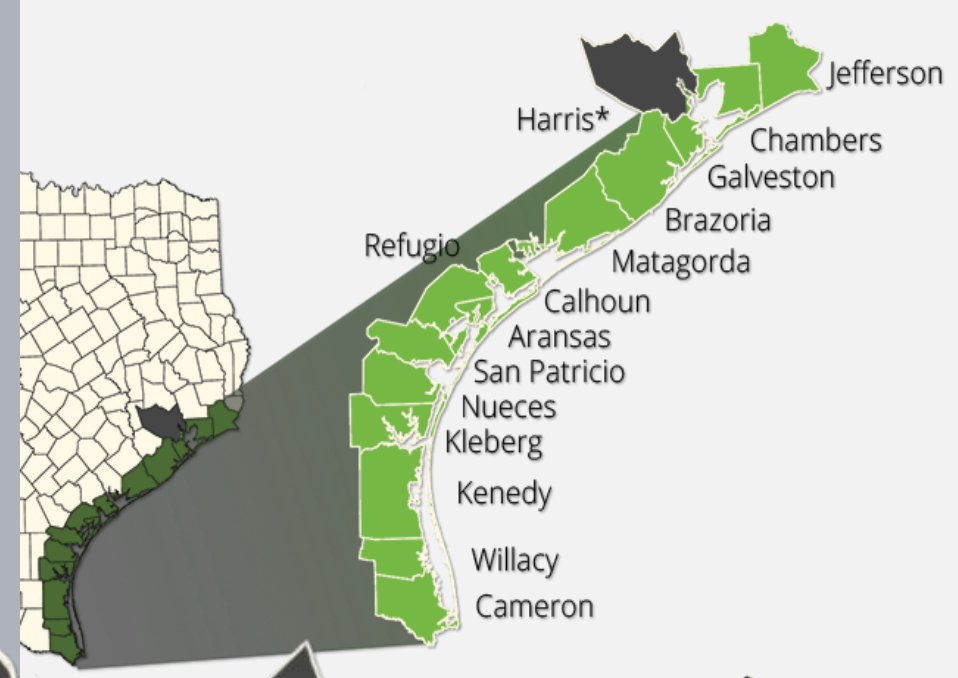
- Slope/Pitch – How steep the roof is. We put it into terms of how many inches it rises vertically over 12 inches horizontally.
- Fascia – The siding/trim that runs around the edge of the roof, at the ends of the rafters.
- Eave – The edge of the roof parallel with the ground.
- Rake – The edge of the roof perpendicular to the ground.
- Windstorm area – Locations inside the TDI Windstorm Map
- TDI – Texas Department of Insurance
- Complete Re-roof – The entire roof of the structure is being replaced.
- Partial re-roof – If any portion of the roof attached the structure is not being replaced.
- ASTM – American Society for Testing and Materials
- WPI-1 – Application for Windstorm Inspection Certificate of Compliance
- WPI-2 – Inspection Verification
- WPI-8 – Certificate of Compliance



FIRST THINGS FIRST – IS THE JOB IN WINDSTORM?

BEFORE YOU START A JOB

- One of the first things you should always do is determine if you are going to require windstorm certification for a job.
- The easiest way is always going to be to just give a call and we will be happy to check for you.
- However, if you are trying to find the information outside of normal business hours the finding out which county the house is in will give you a good idea, and then you can double check with us.
- HAR.com and county tax assessor websites can be good places to try and find the information.



Slope

BEFORE YOU START A JOB



- There are several items you are going to want to check before getting started, one of the foremost and easiest being the slope of the house.
- Shingles can not be installed everywhere, the most common reason being the slope is too low.
- Shingles can not ever be installed on a slope less than 2/12. There are no exceptions to this rule, another material approved for use on such slopes will need to be used.
- Slopes between 2/12 and 4/12 are considered low slopes, and when shingles are installed on them, the underlayment is required to be double layered.
- Slopes between 4/12 and 21/12 are standard slopes. Most of the roofs you encounter will have slopes in this range.
- Slopes 21/12 and greater are considered steep slopes and shingles may have special installation instructions for them.

DETERMINE THE SCOPE

BEFORE YOU START A JOB

- We are going to need to know what type of job it is in order to file the application.
- Is it a complete reroof or a partial reroof? If any water shedding component attached to the structure is not being replaced, it is a partial reroof. This can include patio covers or carports that are tied into the structure, skylights, the drip edge, and even dormers over windows.
- Are any additional structures such as breezeways, garages, or sheds being completed. Are they attached to the main structure or detached from it.
- You may not always know if rafter or decking work is going to be required, but if you think it might be, you need to let us know as soon as possible.



CONFIRM YOUR MATERIALS

BEFORE YOU START A JOB



- Yes, many times you will be using the same materials, but remember, if you ever encounter a material whether it be a new brand of nails, underlayment, or something else, check with us before using it. It may sound crazy, but not all 1 1/4" hot dipped electro galvanized roofing nails are allowed to be used, and if you install a roof using the wrong nails, that is a big expensive issue that will need to be fixed to be certified.
- You can always call or text our lead inspector to make sure a material is acceptable. When in doubt, ask! We want to do all we can to help you succeed and make your lives easier in obtaining certification, but we can not make exceptions to the codes and TDI requirements.

MAKE SURE TO SCHEDULE YOUR INSPECTIONS

BEFORE YOU START A JOB

- This part should be easy, but unfortunately, it gets forgotten by contractors all the time. Once you have a tentative start date scheduled, call or email our office so we can get you on the schedule. If it is a week or more out, and you're not totally sure that's the exact date but you think it might be, no worries, go ahead and let us know and we will confirm with you when the date gets closer.
- It is totally understandable that the weather can be unpredictable, and you may not know you are starting until a day before and occasionally the day of, but the sooner we know, the better service we will be able to provide you. Us getting out to your job as early as possible is as much for you as it is for us. We want to correct mistakes and errors early, before they become problems.



OLD ROOF TEAR OFF

INSTALLATION INFORMATION

- Every section of roof that is being replaced is required to be torn down all the way to the decking. This gives us the opportunity to determine if any decking needs to be replaced. There are limited exceptions for areas that had ice and water shield previously installed, but this decision is made by the inspector on a case-by-case basis.
- If any part of an item is removed, including for instance a nail on a skylight or drip edge, that entire item must be brought up to code for the project to pass certification. In other words, once an old item has been disturbed, it is no longer grandfathered into the current code.



DECKING

INSTALLATION INFORMATION



- Once the old roof has been removed, you will need to note what type of decking the roof has. Is it standard sheets or plank decking.
- You then need to determine if any decking needs to be replaced.
- Plywood used for decking needs to be minimum 3/8" thick. OSB decking needs to be a minimum 7/16" or 15/32".
- Plywood/OSB need to be fastened with minimum 3" framing nails spaced every 4" on the perimeters and 8" in the fields.
- Plank decking replacement sections need to touch a minimum of 3 rafters, and can not be cut for vents.
- Modified bitumen can not be installed on plank decking.
- You need to keep track of how much decking you replace and take pictures of each spot. We need to know how many sheets were replaced on each slope.

UNDERLAYMENT

INSTALLATION INFORMATION



- If you are using felt, it is required to be 30# felt meeting all TDI requirements.
- If you are using synthetic felt, it needs to be on the TDI List of Approved Synthetic Underlayments.
- The underlayment needs to be installed in accordance with application instructions, using 1" plastic cap nails manufactured in accordance with ASTM F1667, spaced according to manufacturer application instructions.
- Remember to double layer if the slope requires it.
- The underlayment needs to be tucked under the drip edge on the rake and overlap the drip edge on the eaves.

SHINGLES

INSTALLATION INFORMATION

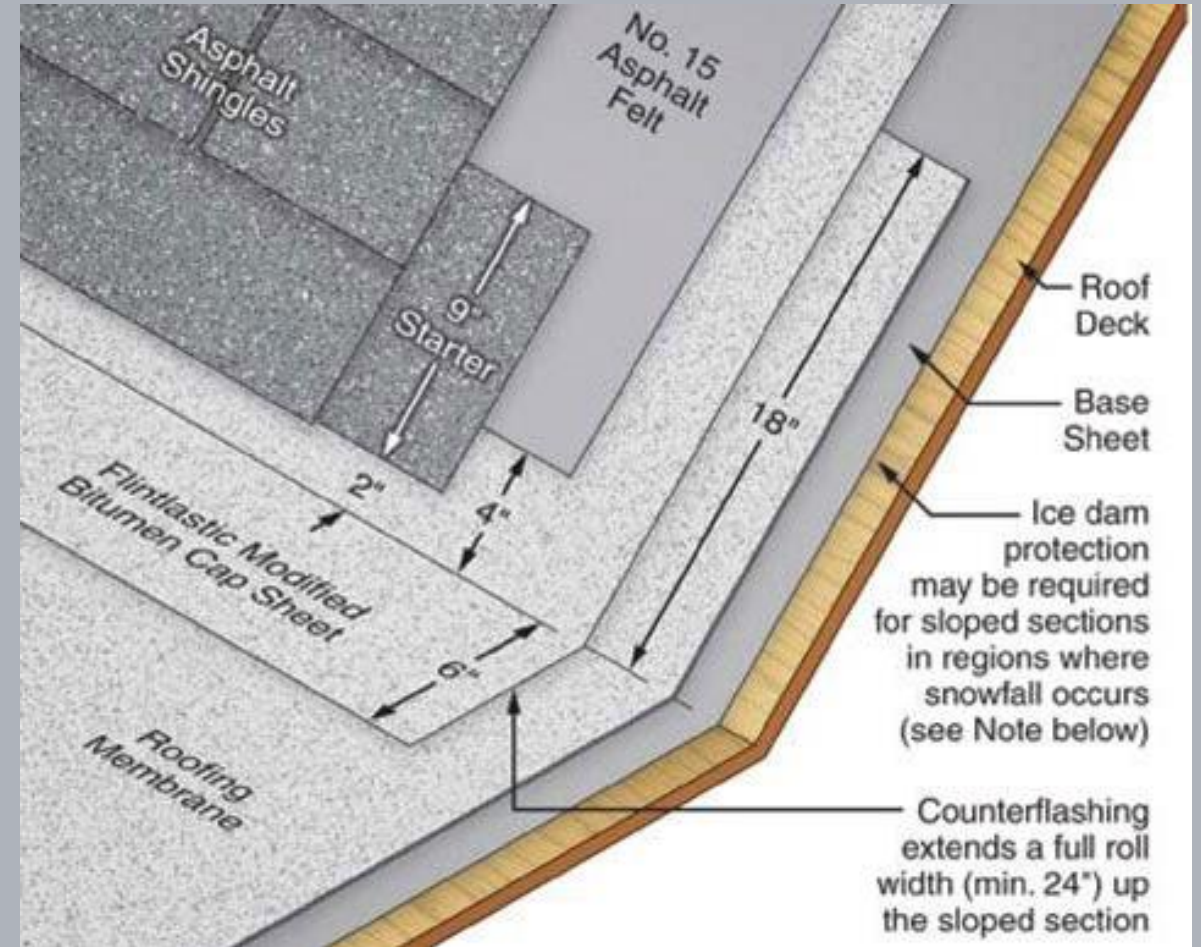
- All shingles need to have ASTM D3161 Class F listed on the bundle.
- Shingles can be installed following 4 or 6 nail pattern; however, it must be 1 of the 2 patterns listed on the packaging. The shingle manufacturer may require a specific pattern be used for warranty purposes.
- Shingles can be hand nailed or gun nailed, however JDSI recommends hand nailing.
- Make sure the nailing pattern matches the pattern on the shingle package, the pattern is followed through out installation, and that nails are not over or under driven.



MODIFIED BITUMEN

INSTALLATION INFORMATION

- Modified bitumen may be used on slopes less than 2/12.
- Modified bitumen does require a positive slope for drainage (water runs away from the house) and a gravel guard drip edge.
- Modified bitumen needs to be cut $\frac{1}{4}$ " back from the edge of the drip edge and the vertical joints need to be sealed.
- Modified bitumen needs to extend a minimum of 18" past the transition up the slope.
- Modified bitumen can not be installed on plank decking.



CAP SHINGLES

INSTALLATION INFORMATION



- Cap shingles are required to be fastened with nails placed on the exposed side of (below) the tar line. Nails should never be placed in the sealant and should not be placed above the tar line.
- Ridge vent cap shingles need to be installed with the nails provided with the ridge vent, standard roofing nails are not large enough to penetrate the decking on these due to the shingles being raised.

FINISHING

INSTALLATION INFORMATION

- Once the installation has been completed, double check to make sure all exposed nails and any necessary joints have been sealed.
- We also recommend checking to make sure supplies and equipment are not left on the roof, it happens more often than you would think.
- If you have any questions or items you would like to check before you leave the site, you can text, call, or email one of our inspectors, we will do our best to respond quickly.



SECOND INSPECTION AND REPAIRS

AFTER INSTALLATION

- Once you have completed the project, our inspector will return to perform a final inspection the next time one is in the area.
- This can often range from the following day to the following week, depending on the project location. If you have a need to have the follow up inspection performed more quickly, let us know and we will do our best to accommodate.
- If repairs or corrections are needed, we will notify you. Once the items have been addressed, depending on the situation, we will either return to inspect again or we may ask you to send us pictures.



CERTIFICATION INFORMATION

AFTER INSTALLATION

- There are 3 different forms in the certification process.
- Once we have scheduled you to start a project, our office will file a WPI-1.
- Once we have verified the project passes inspection, our office will file the WPI-2.
- Once TDI has reviewed the project and determined it to be in compliance, they will issue the WPI-8.
- If you are curious about the certification status you can contact the JDSI office.



IF YOU AREN'T SURE OR FAMILIAR, ASK!

- If there are any unusual items regarding a project that you are unsure of or have questions about, talk to us before proceeding. This can include skylights, flat roofs, special decking, or anything else you are less familiar with or uncertain of.
- We are more than happy to talk to you about any projects. Just as getting something right the first time makes your life easier, it makes ours easier as well. You can always call, text, or email our lead inspector.



JDSI: Contractor Roofing Picture Examples



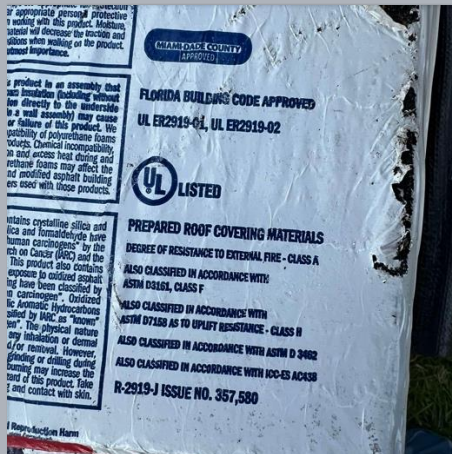
MATERIAL PICTURES

ROOF NAIL BRAND/SIZE SHINGLE BRAND

DRIP EDGE WIDTH

CAP NAIL BRAND/SIZE

DECKING THICKNESS



ROOF NAIL ASTM F1667 SHINGLE BRAND DRIP EDGE HEIGHT CAP NAIL ASTM F1667 UNDERLAYMENT

STARTING PICTURES



FRONT

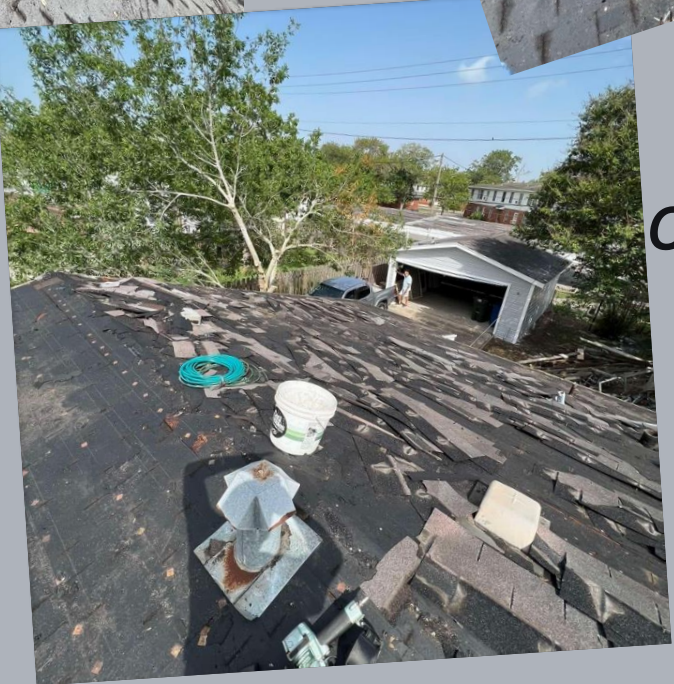
Overall



Rear

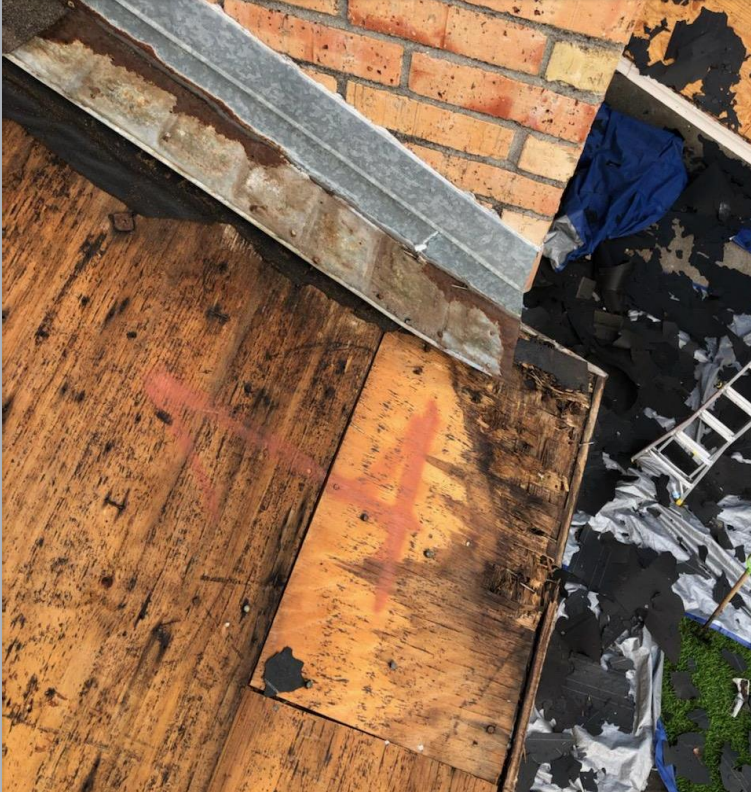


Overall



Overall

Decking Pictures

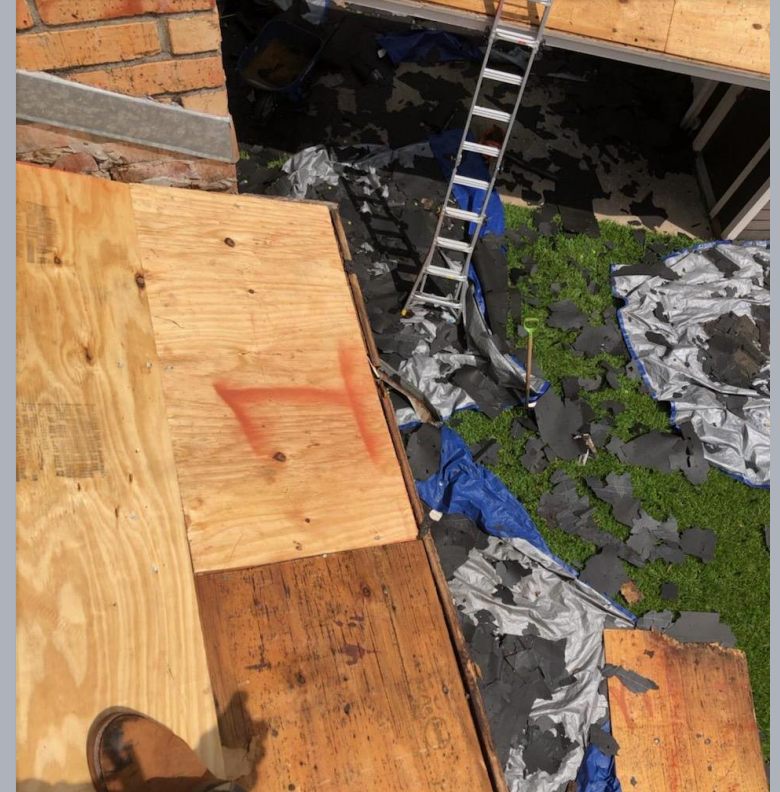


BEFORE

We need an estimate of how many sheets were replaced on each slope.

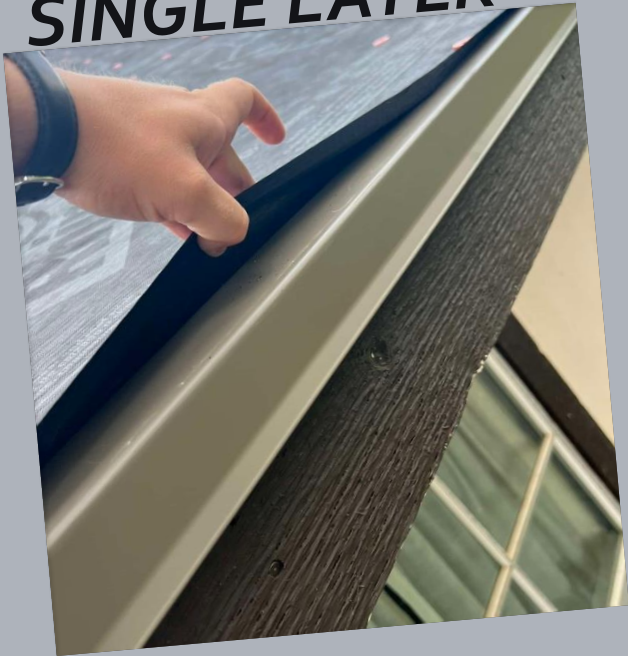
For example:

1 sheet on front slope
1½ sheet on rear slope
No decking replaced on left slope
¾ sheet on right slope



AFTER

SINGLE LAYER



OVERLAP

**UNDERLAYMENT
PICTURES**

RAKE

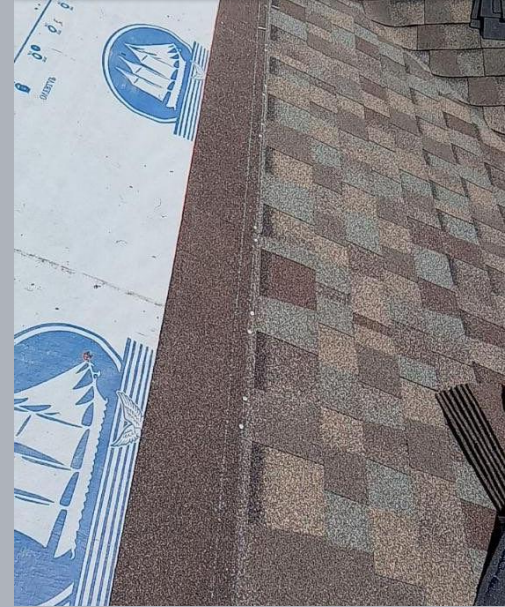


**DOUBLE
LAYER**

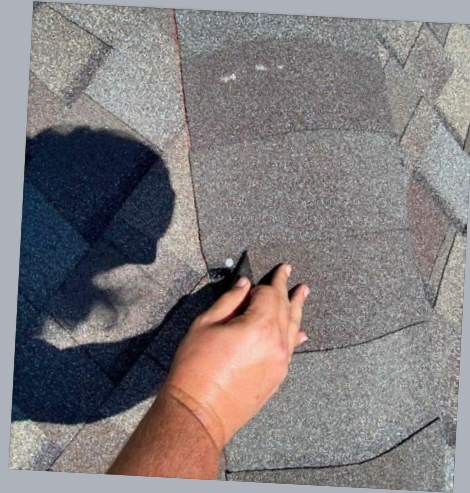
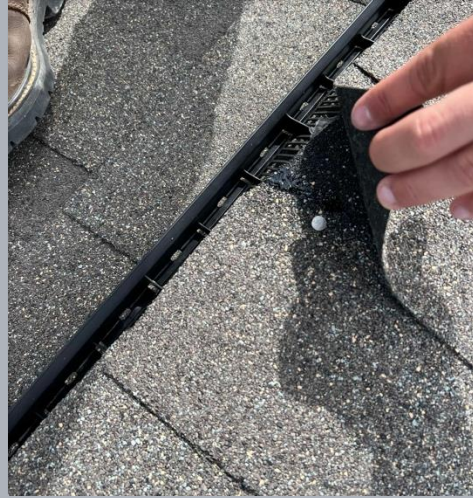
EAVE



SHINGLE NAIL PATTERN PICTURES



CAP SHINGLE NAIL PICTURES



SEALED NAIL PICTURES



Finishing Shingle



Finishing Corner Shingle



Finishing Cap Shingle



Flashing



Roof Jack



Vent



Skylight



Exposed Nail



Electrical Pipe



Satellite

COMPLETION PICTURES

OVERALL



STREET VIEW



OVERALL



OVERALL



OVERALL

WE LOOK FORWARD
TO WORKING WITH
YOU!



JDSI OFFICE CONTACT:

frontoffice@jdsitx.com
281-852-3647