

This was a very thorough house inspection. I think the inspector did a great job, however there are a few oversights or incorrect statements:

1. There is a makeup air system installed in the crawl space. Inspection said none.
2. There is a CO detector mounted on the wall in the upstairs hallway. He said none.
3. The house does not have Radon mitigation. He thinks it does.
4. Old air circulation fan in the crawl space is not hooked up and probably doesn't work.
5. Incorrect conclusion that the sunroom slab is not supported.
6. Incorrect conclusion that the upstairs HVAC ducts are not functioning properly. He admitted he did not run the system due to a thermostat issue (but then stated the ducts are not working properly?)

Here are my comments on each item in the report.

1. Inspection Report oversight. Conditioned Air Supply is present. Look inside the downstairs Family Room closet under the stairs. There is a white PVC intake visible in the floor. A blower in the crawl activates when the heat cycle of the HVAC is running. This supplies conditioned make up combustion air to the furnace since the crawl space is encapsulated. This system was inspected and approved by the town of Apex at the time of the encapsulation inspection.
The encapsulation system and the foundation waterproofing have an associated lifetime warranty which is transferable to the new owner and is for the lifetime of the structure. Both warranty certificates were scanned and provided to Anne Cain. I will have the originals available at the house.
1 (2) Inspection Report is incorrect. A Radon Mitigation is not installed in our house. The house was never Radon tested. The blower labeled Radon was installed by Jason Mullins, owner of Crawl Space & Basement Technologies of Raleigh. Jason refers to his blower and piping system as a "Humidivac" and according to him is designed to remove water vapor beneath the vinyl liner.
1 (3) Air circulation fan shown in the photo is a relic from previous attempts to circulate crawl space air before the space was encapsulated. It is not hooked up.
1 (4) A Humidifier is not necessary according to Jason Mullins. It should not be there, I will unplug it.
1 (5) I agree, the wood is very dry around 13% average moisture content. Not sure where the 17% was found even though it is still below threshold.

1.2 Floors. The rough sawn boards under the sunroom were the concrete forms for the slab. They were left in place to assist with insulating the slab. The slab is resting on a cinderblock foundation wall on each side, not on these boards. This slab support foundation wall is on a normal footer which was poured as part of the house footers. The slab consists of a grid of tied steel reinforcing rods embedded in concrete. This was inspected by Apex before and after pouring.



The picture shows the rebar grid before concrete was poured.

1.2 (3) Apex approved the deck (and the sliding doors) as built without rails. The sliding doors were inspected as windows probably because they were not at floor level

1.2(4) I believe the water stain on the particle board is not an active leak and remains from before the garage/unfinished room roof was replaced. The greenhouse is leaking.

It requires a new top which would be tucked under the first course of shingles and fastened with the greenhouse clips fastening system. This is an XS Smith Greenhouse and is very wind resistant.

1.2(5) Is not part of the floor support system. As an experiment I tried to add a center beam under the Family Room floor to stop knick knacks from rattling when our two granddaughters jumped up and down on the floor. It was somewhat successful but can be removed.

1.4 Not sure what a cricket is. This was the way it was built and has never leaked.

2.1 (5) The sunroom to greenhouse door is in a 100% humidity environment in the greenhouse and is subject to moisture damage. This door is acceptable appearance wise since it looks better than if a more water resistant aluminum storm door were used. Most greenhouses use aluminum storm doors for entry/exit. We didn't like their look in a finished room so opted for this French Door.

2.3 Wall cladding, etc Needs caulk.

2.3(2) Siding is damaged. I was not aware. This needs to be replaced with a Hardi Plank material.

2.3(3) Former antenna cable hole. Should not be there. I will patch with caulk and flashing.

2.8 Bricks are being pushed by roots and are a recurring problem. I will trim the trees touching the house, a task that has to be done periodically.

3.0 Roof debris is a recurring problem. Roof was last swept clean Oct 1 by High Mark Painting of Cary.

3.0(4) Yes, the greenhouse roof leaks and needs replacing.

4.1 Rusty gas pipes. Now that the crawl humidity is under control due to encapsulation I believe rusting has been arrested.

4.3(2) This is the original flue pipe. Double walled pipe was not required at the time of construction. I agree this pipe is inadequate. I will have this replaced

4.3 item 6 and 7 Pipe flashing furnace flue. This pipe was installed by Anthony Maynard HVAC and inspected by Town of Apex as part of the furnace replacement. I'm not sure what to say about this.

4.4 (1) Hose bib loose - this requires a hose bib anchor on the inside foundation wall. I can address this.

5.1(2) This is the relay box for the greenhouse equipment. I agree, the hole needs to be covered for safety. I will replace the cover.

5.0 Item 5 When they installed the backup generator I had a choice of either extending the electrical lines inside the panel or having a new splice box installed which would require sheetrock removal. I chose the former which is not the prettiest solution.

5.3(1) "Home made" extension cord. Not sure why it's there. I will dispose of.

5.3(2) This is not acceptable. All fixtures should be working properly. I will replace light bulbs as necessary.

5.3 Item 3, 4 & 5 will be removed. It is believed these are vestiges from when the Playroom (room over the garage) was used as a plant room. They are not active. Item 2 needs investigating.

5.3 item 6 Not acceptable, cover plate will be added.

5.6 Inspection Report oversight. CO detector is installed in the upstairs hallway near the thermostat. Not sure how it could be missed.

Downstairs CO detector is in the kitchen cabinet. It was removed for wall painting but not reinstalled. I will put it back.

5.7 Item 1. Yes, this should be a GFCI outlet. I was not aware that it was not. It was part of the original construction and approved by the Town of Apex. It's not clear how this got passed back in 1982.

7.0 Refrigerant line insulation. This periodically gets replaced. Critters seem to like chewing on it. I will replace it with new insulation.

7.1 I received notification on my Honeywell phone app that contact with the thermostat was lost Oct 16 at 6 PM. I will investigate. Likely reasons:

1 breaker has tripped (unlikely since this has never happened before)

2 thermostat has failed (possible)

3. Backup thermostat AA batteries are dead (good possibility)

If none of the above I will have to call Anthony Maynor who was the HVAC installer

7.2 In August 2020 while the rooms were being painted the drain in the upstairs AC unit overflowed because the pipe to the outdoors was plugged. Making matters worse the overflow pipe to the backup drain pan under the unit was plugged shut. Water backed up into the duct housing and leaked onto the floor. The drains were cleared, bleach was poured into the drain pipes and the AC now functions normally

8.0 Steps. Rail was removed by painters and reinstalled by them. I will tighten screws

8.0 item 2 No Attic floor guard rail. Approved by Apex in 1982 as constructed

8.2 Wall crack. They happen with season changes. Not a concern.

8.4 Drawer front is repaired and will be returned.

8.5 Item 1 Dining room latch will be adjusted

8.5 Item 2 Door is not insulated. The unfinished room door is attached to a fully insulated room. The walls are insulated and the ceiling is insulated. There is no need to insulate the door to an insulated (but unheated) room.

8.5 Item 3 Kneewall door is weatherstripped. Yes, the wood door is not insulated

8.6 Item 1. Windows stuck shut. All windows were recently painted. We have found a simple paring knife in the track run along the sash tends to free stuck windows. We will free these windows.

9.2 Ventilation fan. We don't think this is true. Maybe it was stuck because it has not been used for over a year? If defective we will replace.

10.1 Item 1 drain pipe too low. Dishwasher drain will be raised and zip tied in position.