RED CEDAR
PROFESSIONAL INSPECTIONS
615-988-0678

Radon Inspection Report

Document Generated
05/21/2023

Document Number
RP22304130027_19May23_1736

Measurement Information

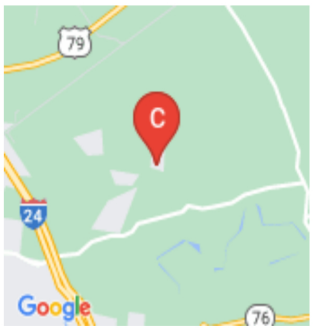
Client Name
John Doe

Measurement Started
05/19/2023 17:37

Measurement Ended
05/21/2023 17:37

Inspection Duration
48hour (Data No : 48)

Measurement Location
209 JOSIE LN
CLARKSVILLE, Tennessee 37043



Measurement Details

Building Type
House

Floor
1st floor

Room Type
Dining room

Building year
2015

Device Infomation

Device S/N
RP22304130027

Device calibrated
04/13/2023

Tester Information

Tester Name
Blain King

Certification # (State-License #)
2750 (TN)

Tester Email
blain@redcedarinspections.com

Tester Phone
615-988-0678

Tester Address
209 JOSIE LN
CLARKSVILLE, Tennessee, 37043

Test-Company Information

Measurement Professional (Certified or State-Licensed)
Blain King

Certification # (State-License #)
2750 (TN)

Email Address
blain@redcedarinspections.com

Phone Number
615-988-0678

Test-Placement Field Technician
Blain King

Test-Placement Field Technician Certification # (State-License #)
2750 (TN)

Test-Retrieval Field Technician
Blain King

Test-Retrieval Technician Certification # (State-License #)
2750 (TN)

Device Information for Measurement

Manufacturer & Model
FTLab & RadonEye Pro

Test Location
Above Crawlspace

Test device placed simultaneously at this property

Duplicate for QA

Manufacturer & Model
FTLab & RadonEye Pro

Test Location
Above Crawlspace

Measurement Started
SUN , 05/19/2023 05:38 PM

Measurement Ended
SUN , 05/21/2023 05:38 PM

Overall Average Radon Concentration
0.79 pCi/L

Inspection Information

Delay Time
0 hour

Inspection Duration
48 hours

Measurement Started
FRI , 05/19/2023 05:37 PM

Measurement Ended
SUN , 05/21/2023 05:37 PM

Measurement Radon Concentration Max
1.8 pCi/ℓ

Measurement Radon Concentration Min
0.1 pCi/ℓ

Overall Average Radon Concentration
0.9 pCi/ℓ

EPA Protocol Average Radon Concentration
0.9 pCi/ℓ

NOTE: The calibrated EPA average excludes the first 4 measures to follow EPA Protocol.

Historical Radon Trend

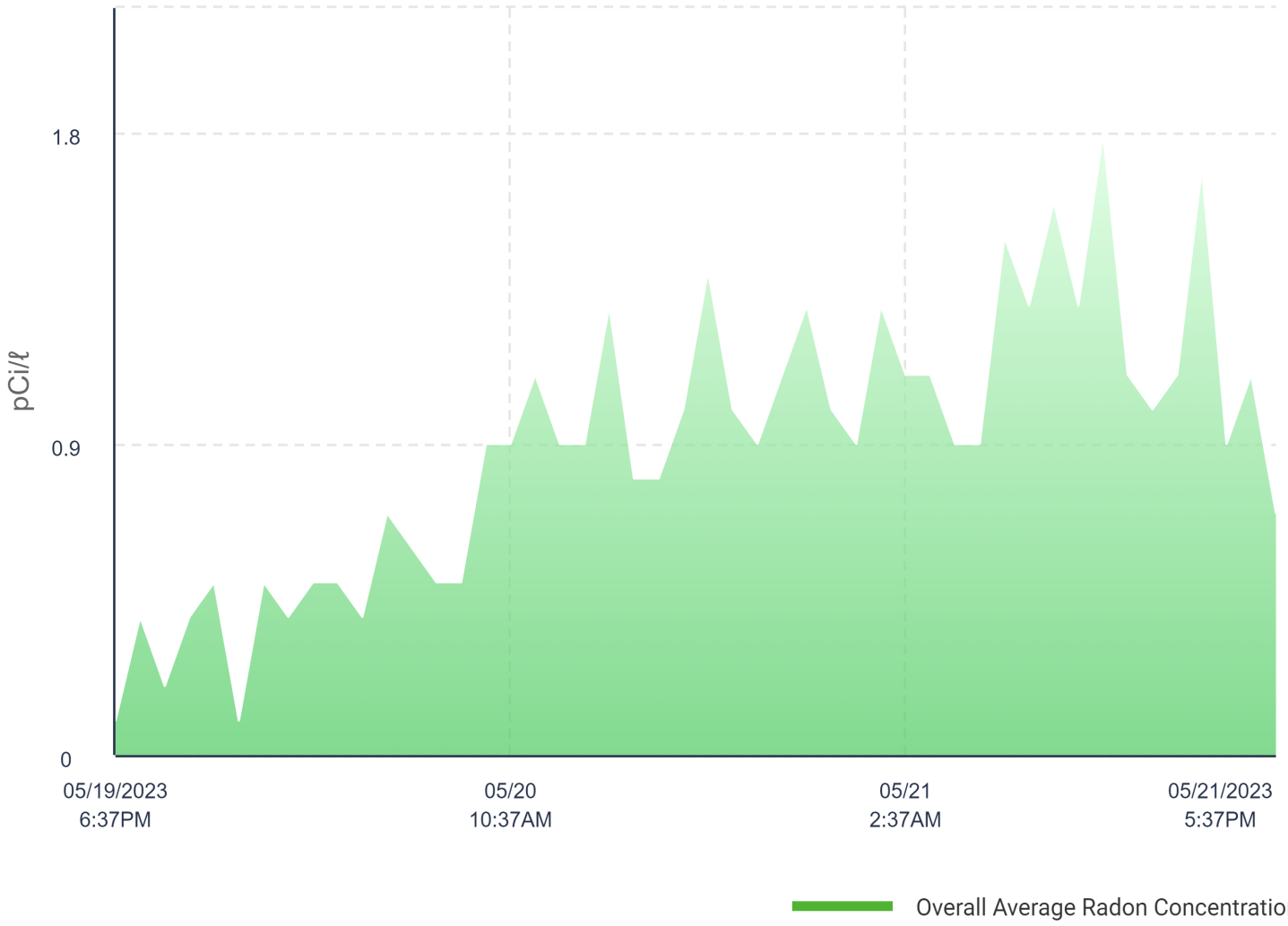


Table of Hourly Radon Measurements

Radon Concentration Average: 0.9 pCi/ℓ

Timestamp	Radon Value	Temp	RH(%)RH	Timestamp	Radon Value	Temp	RH(%)
05/19/23 18:37	0.1	73	51	05/20/23 18:37	1.4	72	50
05/19/23 19:37	0.4	73	51	05/20/23 19:37	1.0	72	49
05/19/23 20:37	0.2	72	51	05/20/23 20:37	0.9	73	49
05/19/23 21:37	0.4	72	50	05/20/23 21:37	1.1	73	48
05/19/23 22:37	0.5	71	50	05/20/23 22:37	1.3	73	48
05/19/23 23:37	0.1	72	50	05/20/23 23:37	1.0	73	48
05/20/23 00:37	0.5	73	49	05/21/23 00:37	0.9	73	48
05/20/23 01:37	0.4	72	50	05/21/23 01:37	1.3	73	48
05/20/23 02:37	0.5	73	50	05/21/23 02:37	1.1	72	49
05/20/23 03:37	0.5	72	50	05/21/23 03:37	1.1	72	49
05/20/23 04:37	0.4	72	50	05/21/23 04:37	0.9	71	49
05/20/23 05:37	0.7	72	50	05/21/23 05:37	0.9	71	49
05/20/23 06:37	0.6	72	51	05/21/23 06:37	1.5	70	49
05/20/23 07:37	0.5	72	51	05/21/23 07:37	1.3	70	49
05/20/23 08:37	0.5	72	51	05/21/23 08:37	1.6	68	46
05/20/23 09:37	0.9	72	51	05/21/23 09:37	1.3	71	46
05/20/23 10:37	0.9	71	53	05/21/23 10:37	1.8	72	47
05/20/23 11:37	1.1	72	52	05/21/23 11:37	1.1	72	48
05/20/23 12:37	0.9	72	52	05/21/23 12:37	1.0	72	49
05/20/23 13:37	0.9	71	51	05/21/23 13:37	1.1	72	50
05/20/23 14:37	1.3	71	51	05/21/23 14:37	1.7	72	50
05/20/23 15:37	0.8	72	51	05/21/23 15:37	0.9	72	50
05/20/23 16:37	0.8	71	50	05/21/23 16:37	1.1	71	50
05/20/23 17:37	1.0	72	50	05/21/23 17:37	0.7	72	49
				Event			
				Movement	05/19/23 18:34		

* Temperature and humidity can vary depending on environmental conditions.
* The test data was taken from a testing device approved by the National Radon Proficiency Program.

Conditions Observed During the Test

1. The property was vacant during the test period	No
2. Passive crawlspace vents to the outside	Yes
2-1. Vents	Closed
2-2. Are they always open?	No
3. Window ac	No
4. ERV/HRV	No
5. Evaporating cooling system	No
6. Sub-slab ducts	No
6-1. HVAC fan setting	Auto
7. Closed-building conditions at time of placement	Yes
7-1. Closed-building conditions at time of retrieval	Yes
8. Devices placed in location as standards require	Yes
9. Indoor temperature at time of placement	73 F
9-1. Indoor temperature at time of retrieval	72 F
10. Signs of interference with test	No
11. Any anomalies in data that may indicate deviation from testing protocol	No
12. Noninterference controls used	Yes
12-1. Explain methods used	Warning tags on unit and in area tested.
13. Noninterference agreement given to responsible individual	Yes
13-1. Noninterference agreement signed by responsible individual	Yes
14. Mitigation system present	No
16. Unusually severe storms or high winds.	No
17. Any temporary mitigation strategies present	No

MEASUREMENT ENVIRONMENTS

Two RadonEye Pro Continuous Radon Monitoring devices were placed on a tripod in the NW corner of the front dining room in accordance with manufacturer and NRPP r ecommendations. The devices were left in place for a period of 48 hour. At the concl usion of the testing period, the devices were collected and the results compiled herei n.

COMMENTS

Recommendations: (as per ANSI-AARST MAH)

Test result is 4.0 pCi/L or greater:

- Fix the building if test results indicate occupants may be exposed to radon concentrations that meet or exceed the EPA action level of 4.0 pCi/L.
- Efforts to reduce radon concentrations are not complete until a retest provides evidence of effectiveness.
    - Complete a short-term radon test between 24 hours and 30 days after the installation of a mitigation system.
    - **Retest every 2 years** to ensure the system remains effective.

Test results between 2.0 and 4.0 pCi/L

- Consider fixing the building if the test results indicate radon levels greater than half the action level.
- Tests conducted when heating systems are active both day and night are more likely to provide a clear characterization of potential radon hazards.

When to Retest

- Retest every 5 years if NO mitigation system is installed.
- Retest in conjunction with the sale of any new or existing buildings.
- Be certain to test again if and when any of the following circumstances occur:
    - A new addition is constructed or alterations for building rehab or reconfiguration occur.
    - A ground contact area not previously tested is occupied, or a home is newly occupied.
    - Heating and cooling systems are significantly altered.
    - Ventilation is significantly altered by extensive weatherization, changes to mechanical systems or comparable procedures.
    - Significant openings to the soil occur due to:
        - Groundwater or slab surface water control systems that are altered or added (ex. sumps, perimeter drain tile, shower/tub retrofits) or,
        - Natural settlement causing major cracks to develop
    - Earthquakes, construction blasting, or formation of sink holes nearby; or
    - A mitigation system is altered, modified or repaired.

Comments

Radon is a colorless, odorless gas that is found in soil. It is the 2nd leading cause of lung cancer (right behind smoking), and it is the #1 cause of lung cancer in non-smokers. The EPA estimates radon exposure of an average 1.3 pCi/L concentration (less than half the EPA's recommended action level) is responsible for approximately 21,000 deaths annually in the United States.

Your EPA Protocol Average Radon Concentration was measured at 0.9 pCi/L. This falls below the EPA's recommended action level of 2.0 pCi/L, which means your home was safe from radon at the time of this test. We recommend you retest in five years, if any structural changes are made to the soil below and around your home (installation of sump pump or French drain, etc.), or if you sell the property.

Please call Red Cedar Professional Inspections at 615-988-0678 if you have any questions or concerns regarding this test, or if you would like to retest any time in the future.

State Radon Information

More information about radon is available by contacting the Department of Health at:

Tennessee

Phone: 615-532-5944 • Website: http://tn.gov/environment/radon • Email: Lexi.brown@tn.gov