



- **Evaluating Structural Policy Coverage in Home Insurance**  
**Evaluating Structural Policy Coverage in Home Insurance Understanding the Scope of Foundation Repair Guarantees Reviewing Contractor Backed Warranty Provisions Examining Conditions That Void Certain Warranties Checking if Homeowner Policies Cover Soil Movement Considering Add On Insurance for Extended Protection Determining Coverage Limitations for Pier Systems Clarifying Fine Print in Repair Service Agreements Seeking Assurance Through Third Party Backed Guarantees Exploring Extended Coverage for Unexpected Repair Costs Exploring Available Options for Warranty Transfers**
- **Visual Inspection Methods for Early Problem Detection**  
**Visual Inspection Methods for Early Problem Detection Using Laser Level Surveys to Track Floor Movement Applying Ground Penetrating Radar for Subsurface Clarity Establishing Baselines with Digital Crack Gauges Harnessing Infrared Thermography for Hidden Moisture Installing Wireless Tilt Meters for Continuous Monitoring Scheduling Routine Evaluations of Structural Support Identifying Early Shifts with Smart Sensor Technology Analyzing Data from Remote Monitoring Systems Assessing Elevation Changes with Precision Tools Reviewing Signs of Deterioration in Hard to Reach Areas Interpreting Detailed Reports from Third Party Engineers**
- **About Us**



In the realm of home ownership, understanding the key components of a residential foundation that require regular evaluation is crucial for maintaining structural integrity and ensuring the safety of your living space. Laser level surveys help detect foundation movement for timely repairs **residential foundation repair service** load-bearing wall. A well-maintained foundation is the bedrock of any sturdy home, supporting everything above it. To keep your foundation in top condition, scheduling routine evaluations of its structural support is essential.

One of the primary components to evaluate is the concrete slab or basement walls. Over time, these can develop cracks due to settling, soil movement, or other environmental factors. Regular inspections can help identify such issues early on, allowing for timely repairs before they become major problems. Look for horizontal, vertical, or diagonal cracks, as well as any signs of moisture or water damage, which can indicate more significant underlying issues.

Another critical aspect to examine is the footings-the base upon which your foundation rests. Footings distribute your home's weight evenly across supportive soil layers below ground level.. Ensuring footings remain stable involves checking for any signs displacement such settlement gaps where foundation meets soil line Additionally inspectors should assess overall levelness house doesn't appear sagging leaning certain directions indicating potential problems beneath surface . Regular evaluations here can prevent costly repairs later by addressing subtle shifts promptly . Also floor joists beams supporting floors above crawl spaces basements must checked routinely decay rot due excess moisture termite infestations These elements crucial maintaining structural soundness entire residence Routine checks help catch early warning signs permitting quick intervention preventing further degradation compromised stability . Lastly evaluators should pay close attention pier posts supporting structures elevated foundations Decks porches alike These components susceptible shifting settling especially soft soils prone flooding Frost heave areas Check connections secure proper spacing between each post Pier depth adequacy soil conditions ensure long term stability addition general yard grading must assess annually guarantee water drains away foundatiinstead towards Redirect flow prevents unwanted pressure hydrostatic buildup surrounding walls basement flooding landscaping considerations impact overall foundation health Finally once aware key areas require consistent monitoring next step establishing schedule conduct evaluations Typically experts recommend annual inspections homes however specific frequency depend factors including age property regional climate recent seismic activity nearby construction projects Owners might opt biannual checks spring fall seasons particularly prone severe weather patterns enable proactive maintenance rather reactive approach Moreover hiring licensed professional experienced structural issues beneficial thorough accurate assessment identify subtle nuances amateurs might overlook Keep diligent records past inspections compare changes time helps track trends pinpoint exact periods accelerated deterioration In conclusion understanding key components residential foundation requiring regular evaluation paramount preservingsafety comfort occupants Schedul routine evaluations structural support goes long way preventing major complications future invest effort now save

significant expense stress later thus enjoy peace knowing resting solid ground literally figuratively

## About load-bearing wall

A **load-bearing wall** or **bearing wall** is a wall that is an active structural element of a building, which holds the weight of the elements above it, by conducting its weight to a foundation structure below it.

Load-bearing walls are one of the earliest forms of construction. The development of the flying buttress in Gothic architecture allowed structures to maintain an open interior space, transferring more weight to the buttresses instead of to central bearing walls. In housing, load-bearing walls are most common in the light construction method known as "platform framing". In the birth of the skyscraper era, the concurrent rise of steel as a more suitable framing system first designed by William Le Baron Jenney, and the limitations of load-bearing construction in large buildings, led to a decline in the use of load-bearing walls in large-scale commercial structures.

## Description

[edit]

A **load-bearing wall** or **bearing wall** is a wall that is an active structural element of a building — that is, it bears the weight of the elements above said wall, resting upon it by conducting its weight to a foundation structure.<sup>[1]</sup> The materials most often used to construct load-bearing walls in large buildings are concrete, block, or brick. By contrast, a curtain wall provides no significant structural support beyond what is necessary to bear its own materials or conduct such loads to a bearing wall.<sup>[2]</sup>

## History

[edit]

Load-bearing walls are one of the earliest forms of construction.<sup>[3]</sup> The development of the flying buttress in Gothic architecture allowed structures to maintain an open interior space, transferring more weight to the buttresses instead of to central bearing walls. The Notre Dame Cathedral is an example of a load-bearing wall structure with flying buttresses.<sup>[4]</sup>

## Application

[edit]

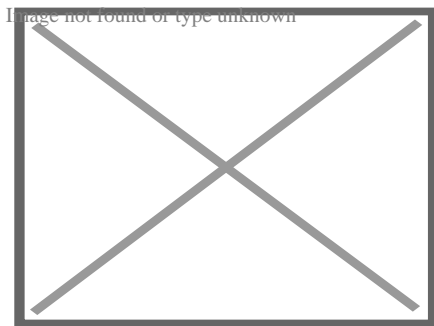
Depending on the type of building and the number of floors, load-bearing walls are gauged to the appropriate thickness to carry the weight above them. Without doing so, it is possible that an outer wall could become unstable if the load exceeds the strength of the material used, potentially

leading to the collapse of the structure. The primary function of this wall is to enclose or divide space of the building to make it more functional and useful. It provides privacy, affords security, and gives protection against heat, cold, sun or rain.[<sup>5</sup>]

## Housing

[edit]

In housing, load-bearing walls are most common in the light construction method known as "platform framing", and each load-bearing wall sits on a wall sill plate which is mated to the lowest base plate. The sills are bolted to the masonry or concrete foundation.[<sup>6</sup>]

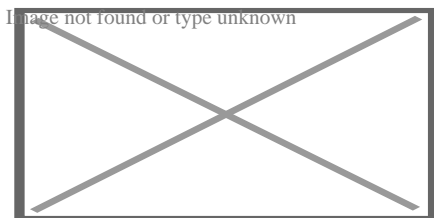


A beam of PSL lumber installed to replace a load-bearing wall at the first floor of a three-story building.

The *top plate* or *ceiling plate* is the top of the wall, which sits just below the platform of the next floor (at the ceiling). The *base plate* or *floor plate* is the bottom attachment point for the wall studs. Using a top plate and a bottom plate, a wall can be constructed while it lies on its side, allowing for end-nailing of the studs between two plates, and then the finished wall can be tipped up vertically into place atop the wall sill; this not only improves accuracy and shortens construction time, but also produces a stronger wall.

## Skyscrapers

[edit]



The Chicago Willis Tower uses a *bundle* of tube structures which, in turn, include numerous outer wall columns.

Due to the immense weight of skyscrapers, the base and walls of the lower floors must be extremely strong. Pilings are used to anchor the building to the bedrock underground. For example, the Burj Khalifa, the world's tallest building as well as the world's tallest structure, uses specially treated and mixed reinforced concrete. Over 45,000 cubic metres (59,000 cu yd) of concrete, weighing more than 110,000 t (120,000 short tons) were used to construct the concrete and steel foundation, which features 192 piles, with each pile being 1.5 m diameter × 43 m long (4.9 ft × 141 ft) and buried more than 50 m (160 ft) deep.<sup>[7]</sup>

## See also

[edit]

- Column – in most larger, multi-storey buildings, vertical loads are primarily borne by columns / pillars instead of structural walls
- Tube frame structure – Some of the world's tallest skyscrapers use load-bearing outer frames – be it single tube (e.g. the old WTC Twin Towers), or *bundled* tube (e.g. the Willis Tower or the Burj Khalifa)

## References

[edit]

1. ^ "How to Identify a Load-Bearing Wall". *Lifehacker*. Retrieved 2020-06-26.
2. ^ "Load-bearing wall". *www.designingbuildings.co.uk*. Retrieved 2020-06-26.
3. ^ Montaner, Carme (2021-03-31). "8º Simposio Iberoamericano de Historia de la Cartografía. El mapa como elemento de conexión cultural entre América y Europa. Barcelona, 21 y 22 de octubre del 2020". *Investigaciones Geográficas* (104). doi:10.14350/rig.60378. ISSN 2448-7279. S2CID 233611245.
4. ^ Mendes, Gilmar de Melo (2012). *El equilibrio de la arquitectura organizativa desde el enfoque de agencia: estudio de un caso (Thesis)*. Universidad de Valladolid. doi:10.35376/10324/921.
5. ^ "7 FUNCTIONAL REQUIREMENTS A BUILDING WALL SHOULD SATISFY". *CivilBlog.Org*. 2015-07-08. Retrieved 2020-05-31.
6. ^ "What is Platform Framing? (with pictures)". *wiseGEEK*. Retrieved 2020-06-26.
7. ^ "Burj Khalifa, Dubai | 182168". *Emporis*. Archived from the original on August 5, 2011. Retrieved 2018-09-17.

## About deep foundation

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- Piling

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## Things To Do in Cook County

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### Sand Ridge Nature Center

**4.8 (96)**

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## River Trail Nature Center

4.6 (235)

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## Palmisano (Henry) Park

4.7 (1262)

## Driving Directions in Cook County

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Driving Directions From Palmisano (Henry) Park to

Driving Directions From Lake Katherine Nature Center and Botanic Gardens to

Driving Directions From Navy Pier to

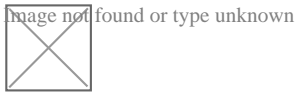
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## Reviews for

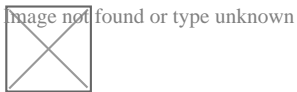
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**Jeffery James**

**(5)**

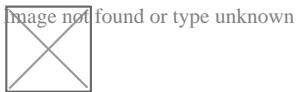
Very happy with my experience. They were prompt and followed through, and very helpful in fixing the crack in my foundation.



**Sarah McNeily**

**(5)**

USS was excellent. They are honest, straightforward, trustworthy, and conscientious. They thoughtfully removed the flowers and flower bulbs to dig where they needed in the yard, replanted said flowers and spread the extra dirt to fill in an area of the yard. We've had other services from different companies and our yard was really a mess after. They kept the job site meticulously clean. The crew was on time and friendly. I'd recommend them any day! Thanks to Jessie and crew.



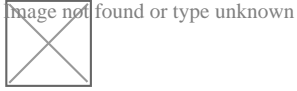
**Jim de Leon**

**(5)**

It was a pleasure to work with Rick and his crew. From the beginning, Rick listened to my concerns and what I wished to accomplish. Out of the 6 contractors that quoted the project, Rick seemed the MOST willing to accommodate my wishes. His pricing was definitely more than fair as well. I had 10 push piers installed to stabilize and lift an addition of my house. The project commenced at the date that Rick had disclosed initially and it was completed within the same time period expected (based on Rick's original assessment). The crew was well informed, courteous, and hard working. They were not loud (even while equipment was being utilized) and were well spoken. My neighbors were very impressed on how polite they were when they entered / exited my property (saying hello or good morning each day when they crossed paths). You can tell they care about the customer concerns. They ensured that the property would be put back as clean as possible by placing MANY sheets of plywood down prior to excavating. They compacted the dirt back in the holes extremely well to avoid large stock piles of soils. All the while, the main office was calling me to discuss updates and expectations of completion. They provided waivers of lien, certificates of insurance, properly acquired permits, and JULIE locates. From a construction background, I can tell you that I did not see any



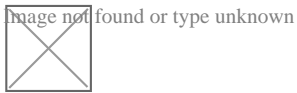
flaws in the way they operated and this an extremely professional company. The pictures attached show the push piers added to the foundation (pictures 1, 2 & 3), the amount of excavation (picture 4), and the restoration after dirt was placed back in the pits and compacted (pictures 5, 6 & 7). Please notice that they also sealed two large cracks and steel plated these cracks from expanding further (which you can see under my sliding glass door). I, as well as my wife, are extremely happy that we chose United Structural Systems for our contractor. I would happily tell any of my friends and family to use this contractor should the opportunity arise!



**Chris Abplanalp**

**(5)**

USS did an amazing job on my underpinning on my house, they were also very courteous to the proximity of my property line next to my neighbor. They kept things in order with all the dirt/mud they had to excavate. They were done exactly in the timeframe they indicated, and the contract was very details oriented with drawings of what would be done. Only thing that would have been nice, is they left my concrete a little muddy with boot prints but again, all-in-all a great job



**Dave Kari**

**(5)**

What a fantastic experience! Owner Rick Thomas is a trustworthy professional. Nick and the crew are hard working, knowledgeable and experienced. I interviewed every company in the area, big and small. A homeowner never wants to hear that they have foundation issues. Out of every company, I trusted USS the most, and it paid off in the end. Highly recommend.

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