



- **Navigating Sustainable Certifications for Building Materials**
Navigating Sustainable Certifications for Building Materials Understanding Environmental Product Declarations in Practice Comparing FSC and Cradle to Cradle Pathways How EPD Data Guides Material Choices Integrating Certification Requirements into BIM Workflows Lifecycle Reporting for Green Building Credits Aligning Supply Chains with Responsible Sourcing Standards Balancing Cost and Compliance in Certification Decisions Reading the Fine Print of Sustainability Labels Auditing Suppliers for Social Responsibility Blockchain Applications in Material Traceability Future Trends in Construction Material Certifications
- **Measuring Embodied Carbon from Quarry to Site**
Measuring Embodied Carbon from Quarry to Site Life Cycle Assessment Basics for Construction Teams Strategies to Lower Carbon Footprints of Concrete Mixes Carbon Accounting for Steel Fabrication Processes Comparing A1 to A3 Emission Factors Across Materials How Reuse Potential Influences Carbon Payback Interpreting EPD Global Warming Potential Figures Using BIM for Early Stage Carbon Estimations Incorporating Embodied Water into Sustainability Goals Circular Economy Metrics for Project Planning Offsetting Material Emissions with Verified Credits Policy Drivers Shaping Carbon Reporting in Building Codes
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Okay, so were talking about figuring out the carbon footprint of stuff we use in construction, right? Specifically, how do we measure the carbon baked into materials like concrete and asphalt, all the way from the quarry where the raw materials are dug up to when it arrives on the building site? Shower components have evolved from basic water delivery to elaborate spa-like experiences **DIY building supplies Canada** Forklift operations. Its a pretty complex puzzle, but a crucial one if we want to build greener.

The first piece of the puzzle is the "extraction" phase. Think about it: getting limestone out of the ground to make cement isnt exactly carbon-neutral. Youve got heavy machinery burning fuel, blasting operations releasing greenhouse gasses, and the sheer disruption of the land itself. We need to account for all that diesel used, the energy consumed by the drills and conveyors, and even the carbon released when the land is disturbed. Its not just about the rock itself; its about everything it takes to get that rock out of the earth.

Then comes the "processing" part. Turning that raw limestone into cement, or crushing aggregate for concrete, involves even more energy-intensive processes. Cement production, in particular, is a notorious carbon emitter. It involves heating materials to incredibly high temperatures, often using fossil fuels, and a chemical reaction that releases a significant amount of CO₂. We need to meticulously track the energy used, the type of fuel burned, and the chemical reactions involved to get an accurate picture of the carbon footprint at this stage.

But its not enough to just look at the big picture. We need to drill down (pun intended!) into the details. What kind of machinery is being used? How efficiently is it operating? Whats the source of the energy? Are there any opportunities to switch to cleaner energy sources or more efficient processes? Are there alternative materials with lower embodied carbon that could be used?

Measuring all this embodied carbon is tricky. We rely on things like Life Cycle Assessments (LCAs), which are basically detailed inventories of all the inputs and outputs associated with a product or process. But LCAs can be complex and time-consuming, and the data they rely on isnt always readily available or consistent. We need to improve the accuracy and accessibility of this data so that architects, engineers, and contractors can make informed decisions about the materials they use.

Quantifying these emissions isnt just about numbers; its about driving change. By understanding the carbon footprint of extraction and processing, we can identify the biggest opportunities for reducing emissions and encourage the adoption of more sustainable

practices in the construction industry. Ultimately, its about building a future where our buildings are not only strong and durable but also kinder to the planet.

Key Certifications to Look for in Building Supplies —

- Understanding the Landscape of Sustainable Building Material Certifications
- Key Certifications to Look for in Building Supplies
- Decoding Certification Labels: What Do They Really Mean?
- Matching Certifications to Project Goals and Building Types
- The Cost Factor: Balancing Sustainability and Budget
- Sourcing Certified Building Supplies: A Practical Guide
- Avoiding Greenwashing: Verifying Claims and Ensuring Authenticity

The transportation of materials from the quarry to the construction site plays a significant role in the overall embodied carbon footprint of a project. When we talk about measuring embodied carbon, its crucial to consider not just the emissions generated during the production of materials, but also those associated with their transportation.

Embodied carbon refers to the greenhouse gas emissions associated with various stages of a buildings life cycle, from material extraction and manufacturing to transportation and construction. Transportation impact is a key component because it involves moving heavy materials over potentially long distances, which can lead to substantial carbon emissions.

The type of transport used-whether trucks, trains, or ships-greatly influences the level of emissions. For instance, road transport via diesel trucks typically has a higher carbon footprint per tonne-kilometer than rail or sea transport. Therefore, optimizing logistics by choosing more efficient modes of transport can significantly reduce the embodied carbon associated with moving materials from quarry to site.

Moreover, distance plays a critical role. Sourcing materials locally can drastically cut down on transportation-related emissions. A shorter haul means fewer kilometers traveled and less fuel

consumed. Conversely, importing materials from far away increases the carbon footprint due to longer travel distances.

To accurately measure and manage transportation impact on embodied carbon, its essential to gather detailed data on distances traveled and modes of transport used. This information can then be combined with emission factors specific to each mode of transport to calculate the total emissions.

In conclusion, understanding and mitigating the transportation impact on embodied carbon is vital for reducing the overall environmental footprint of construction projects. By choosing local sources and more efficient modes of transport, we can make significant strides toward more sustainable building practices.

Decoding Certification Labels: What Do They Really Mean?

Okay, lets talk about the on-site handling and installation carbon footprint when were looking at embodied carbon – that whole "quarry to site" picture. We often get so focused on the big numbers from extracting materials and manufacturing them that we can overlook what happens once those materials actually arrive on the construction site. But the truth is, how we handle and install those materials contributes to the overall carbon footprint, and its worth paying attention to.

Think about it: youve got trucks delivering materials, maybe idling for long periods. Then theres the equipment used to move things around – forklifts, cranes, maybe even smaller machinery like power tools. All of that burns fuel, and that fuel releases carbon dioxide into the atmosphere. The more inefficient our processes, the more fuel we burn.

And its not just the direct fuel consumption. Consider the waste generated during installation. Offcuts of materials that end up in the dumpster require energy to dispose of, and that disposal itself can release greenhouse gasses. Poor planning, leading to rework and

unnecessary material usage, also contributes to a higher footprint.

So, what can we do? First, we need to actually *measure* this on-site component. That means tracking fuel consumption, quantifying waste, and understanding the efficiency of our installation processes. Then we can start looking for ways to improve. Simple things like optimizing delivery schedules to reduce vehicle idling, using more energy-efficient equipment, and training workers to minimize waste can make a real difference. Lean construction principles, which focus on eliminating waste and improving efficiency, are particularly relevant here.

Ultimately, understanding and minimizing the on-site handling and installation carbon footprint is about taking a holistic view of embodied carbon. Its about recognizing that every stage of the process, from the quarry to the final installation, contributes to the overall impact. By focusing on efficiency and reducing waste at every step, we can significantly lower the carbon footprint of our buildings and infrastructure. And thats a goal worth striving for.





Matching Certifications to Project Goals and Building Types

In the quest to mitigate the environmental impact of construction, understanding the embodied carbon of building materials from quarry to site is crucial. A comparative analysis of different building materials sheds light on their respective carbon footprints and aids in making informed, sustainable choices.

Starting with concrete, a ubiquitous material in modern construction, its production is notorious for high carbon emissions. The process of creating cement, a key component of concrete, involves heating limestone and clay at high temperatures, releasing significant amounts of CO₂. From quarry to site, the embodied carbon of concrete can be substantial due to both production and transportation.

In contrast, timber offers a lower embodied carbon footprint. Sourced from sustainably managed forests, timber not only sequesters carbon during its growth but also requires less energy-intensive processes for harvesting and transportation. However, its essential to consider the full lifecycle; if improperly managed or sourced from non-renewable forests, the benefits can be negated.

Steel presents another interesting case. While its production is energy-intensive and contributes significantly to embodied carbon, advancements in recycling have begun to offset some of these impacts. Modern steel production increasingly relies on recycled scrap metal, which reduces the need for virgin ore extraction and subsequent processing-lowering overall emissions.

Bricks are another common building material whose embodied carbon varies based on manufacturing techniques. Traditional clay bricks require firing at high temperatures, similar to cement production. Conversely, innovative alternatives like fly ash bricks utilize industrial byproducts and can reduce embodied carbon considerably.

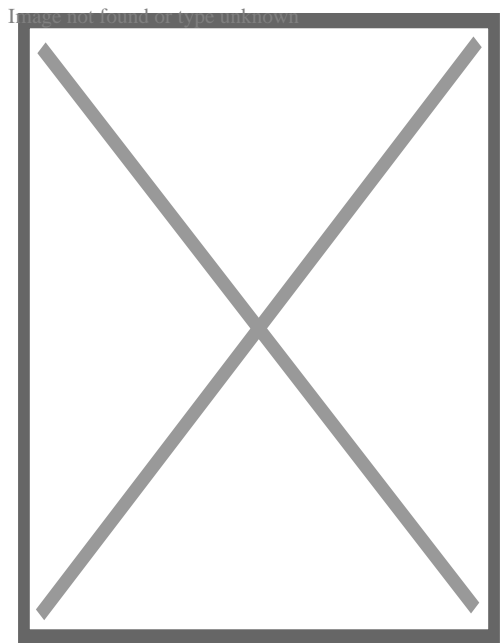
When comparing these materials from quarry to site, it becomes evident that each has unique characteristics affecting their environmental impact. Concrete's widespread use makes its high embodied carbon a critical concern needing urgent attention through technological innovation or alternative binders like geopolymers. Timber's renewability positions it as a promising low-carbon option if managed sustainably. Steel's potential for recycling highlights the importance of circular economy principles in reducing embodied carbon over time. Bricks demonstrate how material choices can evolve towards sustainability by utilizing waste products effectively.

In conclusion, a comparative analysis reveals that no single material stands out as universally superior; instead, each offers different advantages and challenges in managing embodied carbon from quarry to site. By understanding these nuances, architects and builders can make strategic decisions that align with broader goals of environmental stewardship in construction practices.

About carpentry

"Carpenters" and "Carpenter" redirect here. For the American pop duo, see The Carpenters. For other uses, see Carpenter (disambiguation).

Carpentry



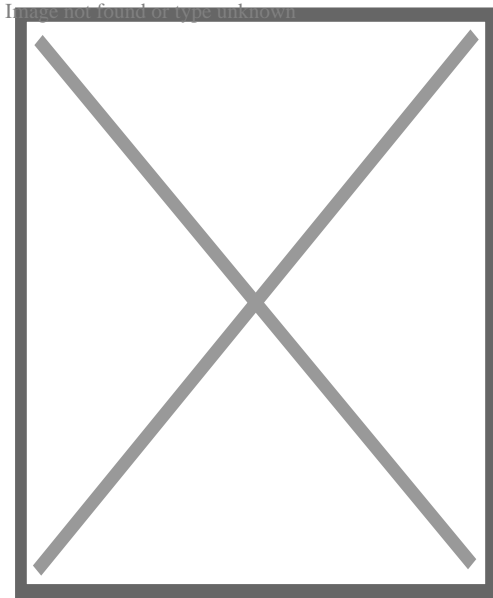
Occupation

Occupation type Professional

Activity sectors Construction

Description

Education required No



Carpentry includes such specialties as barrelmaker, cabinetmaker, framer, luthier, and ship's carpenter

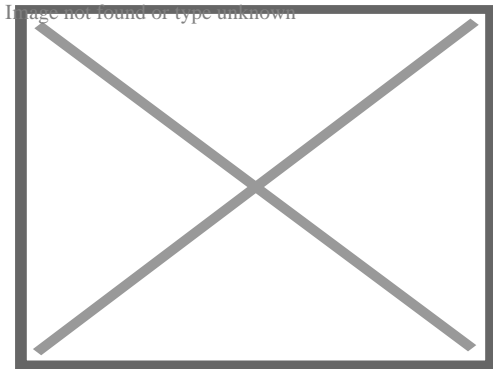
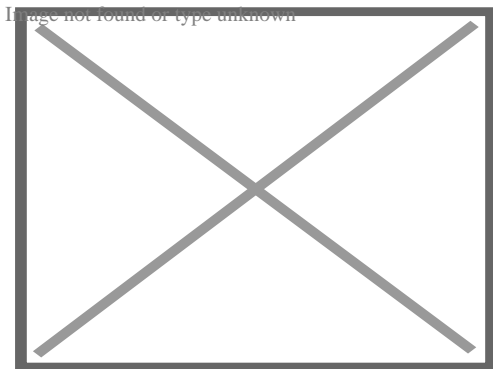


Exhibit of traditional European carpenter's tools in Italy



Carpenters in an Indian village working with hand tools

Carpentry is a skilled trade and a craft in which the primary work performed is the cutting, shaping and installation of building materials during the construction of buildings, ships, timber bridges, concrete formwork, etc. Carpenters traditionally worked with natural wood and did rougher work such as framing, but today many other materials are also used^[1]

and sometimes the finer trades of cabinetmaking and furniture building are considered carpentry. In the United States, 98.5% of carpenters are male, and it was the fourth most male-dominated occupation in the country in 1999. In 2006 in the United States, there were about 1.5 million carpentry positions. Carpenters are usually the first tradesmen on a job and the last to leave.^[2] Carpenters normally framed post-and-beam buildings until the end of the 19th century; now this old-fashioned carpentry is called timber framing. Carpenters learn this trade by being employed through an apprenticeship training—normally four years—and qualify by successfully completing that country's competence test in places such as the United Kingdom, the United States, Canada, Switzerland, Australia and South Africa.^[3] It is also common that the skill can be learned by gaining work experience other than a formal training program, which may be the case in many places.

Carpentry covers various services, such as furniture design and construction, door and window installation or repair, flooring installation, trim and molding installation, custom woodworking, stair construction, structural framing, wood structure and furniture repair, and restoration.

Etymology

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The word "carpenter" is the English rendering of the Old French word *carpentier* (later, *charpentier*) which is derived from the Latin *carpentarius* [*artifex*], "(maker) of a carriage."^[4] The Middle English and Scots word (in the sense of "builder") was *wright* (from the Old English *wryhta*, cognate with *work*), which could be used in compound forms such as *wheelwright* or *boatwright*.^[5]

In the United Kingdom

[edit]

In the UK, carpentry is used to describe the skill involved in *first fixing* of timber items such as construction of roofs, floors and timber framed buildings, i.e. those areas of construction that are normally hidden in a finished building. An easy way to envisage this is that first fix work is all that is done before plastering takes place. The second fix is done after plastering takes place. *Second fix* work, the installation of items such as skirting boards, architraves, doors, and windows are generally regarded as carpentry, however, the off-site manufacture and pre-finishing of the items is regarded as joinery.^[6]^[7] Carpentry is also used to construct the formwork into which concrete is poured during the building of structures such as roads and highway overpasses. In the UK, the skill of making timber formwork for poured or in situ concrete is referred to as *shuttering*.

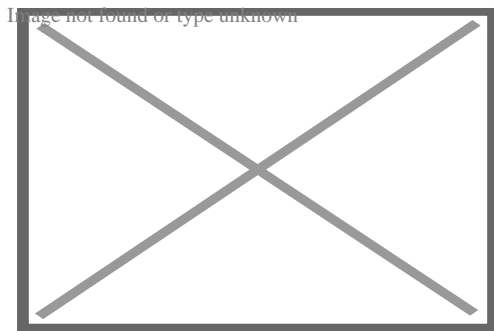
In the United States

[edit]

Carpentry in the United States is historically defined similarly to the United Kingdom as the "heavier and stronger"^[8] work distinguished from a joiner "...who does lighter and more ornamental work than that of a carpenter..." although the "...work of a carpenter and joiner are often combined."^[9] Joiner is less common than the terms *finish carpenter* or *cabinetmaker*. The terms *housewright* and *barnwright* were used historically and are now occasionally used by carpenters who work using traditional methods and materials. Someone who builds custom concrete formwork is a *form carpenter*.

History

[edit]



Log church building in Russia reached considerable heights such as this 17th century example

Along with stone, wood is among the oldest building materials. The ability to shape it into tools, shelter, and weapons improved with technological advances from the Stone Age to the Bronze Age to the Iron Age. Some of the oldest archaeological evidence of carpentry are water well casings. These include an oak and hazel structure dating from 5256 BC, found in Ostrov, Czech Republic,^[10] and one built using split oak timbers with mortise and tenon and notched corners excavated in eastern Germany, dating from about 7,000 years ago in the early Neolithic period.^[11]

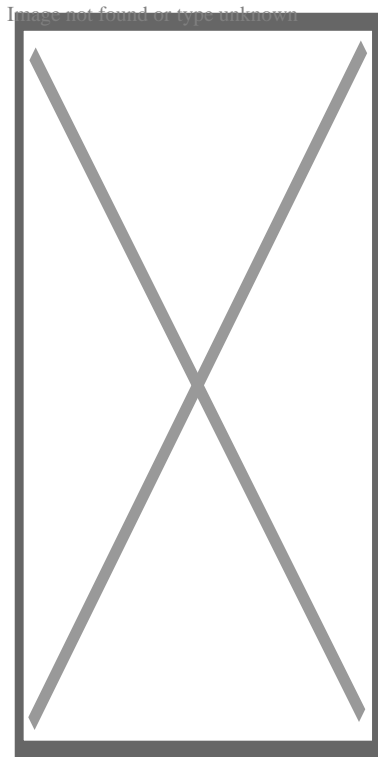
Relatively little history of carpentry was preserved before written language. Knowledge and skills were simply passed down over the generations. Even the advent of cave painting and writing recorded little. The oldest surviving complete architectural text is Vitruvius' ten books collectively titled *De architectura*, which discuss some carpentry.^[citation needed] It was only with the invention of the printing press in the 15th century that this began to change, albeit slowly, with builders finally beginning to regularly publish guides and pattern books in the 18th and 19th centuries.

Some of the oldest surviving wooden buildings in the world are temples in China such as the Nanchan Temple built in 782, Greensted Church in England, parts of which are from the 11th century, and the stave churches in Norway from the 12th and 13th centuries.

Europe

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By the 16th century, sawmills were coming into use in Europe. The founding of America was partly based on a desire to extract resources from the new continent including wood for use in ships and buildings in Europe. In the 18th century part of the Industrial Revolution was the invention of the steam engine and cut nails.^[12] These technologies combined with the invention of the circular saw led to the development of balloon framing which was the beginning of the decline of traditional timber framing.



Axonometric diagram of balloon framing

The 19th century saw the development of electrical engineering and distribution which allowed the development of hand-held power tools, wire nails, and machines to mass-produce screws. In the 20th century, portland cement came into common use and concrete foundations allowed carpenters to do away with heavy timber sills. Also, drywall (plasterboard) came into common use replacing lime plaster on wooden lath. Plywood, engineered lumber, and chemically treated lumber also came into use.^[13]

For types of carpentry used in America see American historic carpentry.

Training

[edit]

Carpentry requires training which involves both acquiring knowledge and physical practice. In formal training a carpenter begins as an apprentice, then becomes a journeyman, and with enough experience and competency can eventually attain the status of a master carpenter. Today pre-apprenticeship training may be gained through non-union vocational programs such as high school shop classes and community colleges.

Informally a laborer may simply work alongside carpenters for years learning skills by observation and peripheral assistance. While such an individual may obtain journeyman status by paying the union entry fee and obtaining a journeyman's card (which provides the right to work on a union carpentry crew) the carpenter foreman will, by necessity, dismiss any worker who presents the card but does not demonstrate the expected skill level.

Carpenters may work for an employer or be self-employed. No matter what kind of training a carpenter has had, some U.S. states require contractors to be licensed which requires passing a written test and having minimum levels of insurance.

Schools and programs

[edit]

Formal training in the carpentry trade is available in seminars, certificate programs, high-school programs, online classes, in the new construction, restoration, and preservation carpentry fields.^[14] Sometimes these programs are called pre-apprenticeship training.

In the modern British construction industry, carpenters are trained through apprenticeship schemes where general certificates of secondary education (GCSE) in Mathematics, English, and Technology help but are not essential. However, this is deemed the preferred route, as young people can earn and gain field experience whilst training towards a nationally recognized qualification.

There are two main divisions of training: construction-carpentry and cabinetmaking. During pre-apprenticeship, trainees in each of these divisions spend 30 hours a week for 12 weeks in classrooms and indoor workshops learning mathematics, trade terminology, and skill in the use of hand and power tools. Construction-carpentry trainees also participate in calisthenics to prepare for the physical aspect of the work.

Upon completion of pre-apprenticeship, trainees who have passed the graded curriculum (taught by highly experienced journeyperson carpenters) are assigned to a local union and to union carpentry crews at work on construction sites or in cabinet shops as First Year Apprentices. Over the next four years, as they progress in status to Second Year, Third Year, and Fourth Year Apprentice, apprentices periodically return to the training facility every three months for a week of more detailed training in specific aspects of the trade.

In the United States, fewer than 5% of carpenters identify as female. A number of schools in the U.S. appeal to non-traditional tradespeople by offering carpentry classes for and taught by women, including Hammerstone: Carpentry for Women in Ithaca, NY, Yestermorrow in Waitsfield, VT and Oregon Tradeswomen in Portland, OR.

Apprenticeships and journeyperson

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Tradesmen in countries such as Germany and Australia are required to fulfill formal apprenticeships (usually three to four years) to work as professional carpenters. Upon graduation from the apprenticeship, they are known as journeyperson carpenters.

Up through the 19th and even the early 20th century, the journeyperson traveled to another region of the country to learn the building styles and techniques of that area before (usually) returning home. In modern times, journeypeople are not required to travel, and the term now refers to a level of proficiency and skill. Union carpenters in the United States, that is, members of the United Brotherhood of Carpenters and Joiners of America, are required to pass a skills test to be granted official journeyperson status, but uncertified professional carpenters may also be known as journeypersons based on their skill level, years of experience, or simply because they support themselves in the trade and not due to any certification or formal woodworking education.

Professional status as a journeyperson carpenter in the United States may be obtained in a number of ways. Formal training is acquired in a four-year apprenticeship program administered by the United Brotherhood of Carpenters and Joiners of America, in which journeyperson status is obtained after successful completion of twelve weeks of pre-apprenticeship training, followed by four years of on-the-job field training working alongside journeyperson carpenters. The Timber Framers Guild also has a formal apprenticeship program for traditional timber framing. Training is also available in groups like the Kim B?ng woodworking village in Vietnam where apprentices live and work to learn woodworking and carpentry skills.

In Canada, each province sets its own standards for apprenticeship. The average length of time is four years and includes a minimum number of hours of both on-the-job training and technical instruction at a college or other institution. Depending on the number of

hours of instruction an apprentice receives, they can earn a Certificate of Proficiency, making them a journeyperson, or a Certificate of Qualification, which allows them to practice a more limited amount of carpentry. Canadian carpenters also have the option of acquiring an additional Interprovincial Red Seal that allows them to practice anywhere in Canada. The Red Seal requires the completion of an apprenticeship and an additional examination.

Master carpenter

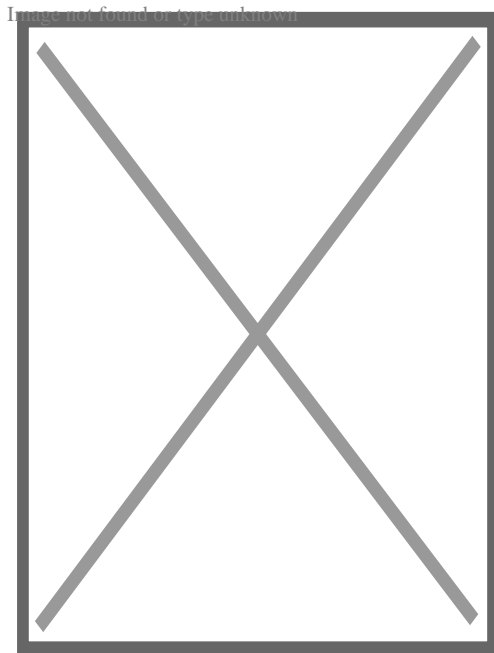
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After working as a journeyperson for a while, a carpenter may go on to study or test as a master carpenter. In some countries, such as Germany, Iceland and Japan, this is an arduous and expensive process, requiring extensive knowledge (including economic and legal knowledge) and skill to achieve master certification; these countries generally require master status for anyone employing and teaching apprentices in the craft. In others, like the United States, 'master carpenter' can be a loosely used term to describe any skilled carpenter.

Fully trained carpenters and joiners will often move into related trades such as shop fitting, scaffolding, bench joinery, maintenance and system installation.

Materials

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The Centre Pompidou-Metz museum under construction in Metz, France. The building possesses one of the most complex examples of carpentry built to date and is composed of 16 kilometers of glued laminated timber for a surface area of 8,000 m².

Carpenters traditionally worked with natural wood which has been prepared by splitting (riving), hewing, or sawing with a pit saw or sawmill called lumber (American English) or timber (British English). Today natural and engineered lumber and many other building materials carpenters may use are typically prepared by others and delivered to the job site. In 2013 the carpenters union in America used the term carpenter for a catch-all position. Tasks performed by union carpenters include installing "...flooring, windows, doors, interior trim, cabinetry, solid surface, roofing, framing, siding, flooring, insulation, ...acoustical ceilings, computer-access flooring, metal framing, wall partitions, office furniture systems, and both custom or factory-produced materials, ...trim and molding,... ceiling treatments, ... exposed columns and beams, displays, mantels, staircases...metal studs, metal lath, and drywall..."^[15]

Health and safety

[edit]

United States

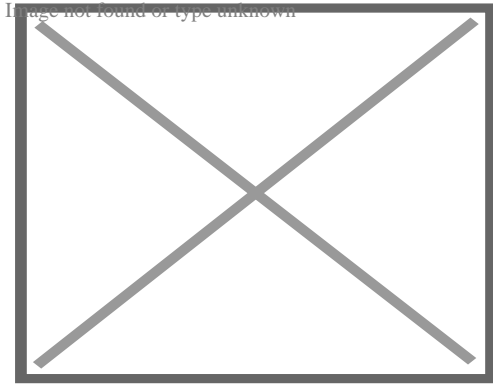
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Carpentry is often hazardous work. Types of woodworking and carpentry hazards include: machine hazards, flying materials, tool projection, fire and explosion, electrocution, noise, vibration, dust, and chemicals. In the United States the Occupational Safety and Health Administration (OSHA) tries to prevent illness, injury, and fire through regulations. However, self-employed workers are not covered by the OSHA act.^[16] OSHA claims that "Since 1970, workplace fatalities have been reduced by more than 65 percent and occupational injury and illness rates have declined by 67 percent. At the same time, U.S. employment has almost doubled."^[17] The leading cause of overall fatalities, called the "fatal four," are falls, followed by struck by object, electrocution, and caught-in/between. In general construction "employers must provide working conditions that are free of known dangers. Keep floors in work areas in a clean and, so far as possible, dry condition. Select and provide required personal protective equipment at no cost to workers. Train workers about job hazards in a language that they can understand."^[18] Examples of how to prevent falls includes placing railings and toe-boards at any floor opening which cannot be well covered and elevated platforms and safety harness and lines, safety nets, stair railings, and handrails.

Safety is not just about the workers on the job site. Carpenters' work needs to meet the requirements in the Life Safety Code such as in stair building and building codes to promote long-term quality and safety for the building occupants.

Types of carpentry

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A team of carpenters assembling a Tarrant hut during World War I

- *Conservation carpenter* works in architectural conservation, known in the U.S. as a "preservation" or "restoration"; a carpenter who works in historic preservation, maintaining structures as they were built or restoring them to that condition.
- *Cooper*, a barrel maker.
- *Formwork carpenter* creates the shuttering and falsework used in concrete construction, and reshores as necessary.
- *Framer* is a carpenter who builds the skeletal structure or wooden framework of buildings, most often in the platform framing method. A framer who specializes in building with timbers and traditional joints rather than studs is known as a *timber framer*.
- *Log builder* builds structures of stacked horizontal logs with limited joints.
- *Joiner* (a traditional name now rare in North America), is one who does cabinetry, furniture making, fine woodworking, model building, instrument making, parquetry, joinery, or other carpentry where exact joints and minimal margins of error are important. Various types of joinery include:
 - *Cabinetmaker* is a carpenter who does fine and detailed work specializing in the making of cabinets made from wood, wardrobes, dressers, storage chests, and other furniture designed for storage.
 - *Finish carpenter* (North America), also *trim carpenter*, specializes in installing millwork ie; molding and trim, (such as door and window casings, mantels, crown mouldings, baseboards), engineered wood panels, wood flooring and other types of ornamental work such as turned or Carved objects. Finish carpenters pick up where framing ends off, including hanging doors and installing cabinets. Finish Carpenters are often referred to colloquially as "millworkers", but this title actually pertains to the creation of moldings on a mill.

- *Furniture maker* is a carpenter who makes standalone furniture such as tables, and chairs.
- *Luthier* is someone who makes or repairs stringed instruments. The word luthier comes from the French word for lute, "luth".
- *Set carpenter* builds and dismantles temporary scenery and sets in film-making, television, and the theater.
- *Shipwright* specializes in fabrication maintenance, repair techniques, and carpentry specific to vessels afloat. When assigned to a ship's crew would they would be known as a "Ship's Carpenter". Such a carpenter patrols the vessel's carpenter's walk to examine the hull for leaks.

Other

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- Japanese carpentry, *daiku* is the simple term for carpenter, a *Miya-daiku* (temple carpenter) performs the work of both architect and builder of shrines and temples, and a *sukiya-daiku* works on teahouse construction and houses. *Sashimono-shi* build furniture and *tateguya* do interior finishing work.^[19]
- *Green carpentry* specializes in the use of environmentally friendly,^[20] energy-efficient^[21] and sustainable^[22] sources of building materials for use in construction projects. They also practice building methods that require using less material and material that has the same structural soundness.^[23]
- *Recycled (reclaimed, repurposed)* carpentry is carpentry that uses scrap wood and parts of discarded or broken furniture to build new wood products.

See also

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- Japanese carpentry – Distinctive woodworking style
- Ship's carpenter – Ship crewman responsible for maintaining wooden structures
- Traditional trades – Category of building trades
- Woodworking – Process of making objects from wood
- Worshipful Company of Carpenters – Livery company of the City of London

References

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1. ^ Roza, Greg. *A career as a* . New York: Rosen Pub., 2011. 6. Print.
2. ^ Vogt, Floyd, and Gaspar J. Lewis. *Carpentry*. 4th ed. Clifton Park, NY: Thomson Delmar Learning, 2006.xvi Print.
3. ^ *"Carpenter | Careers in Construction"*. *www.careersinconstruction.ca*.
4. ^ The American heritage dictionary of the English language Archived June 7, 2007, at the Wayback Machine - Etymology of the word "carpenter"
5. ^ The American Heritage Dictionary of the English Language: Fourth Edition. 2000.

6. ^ "What's the Difference Between a Carpenter and a Joiner?" (30 April 2015). *InternationalTimber.com*. Retrieved 2 January 2020.
7. ^ "Joiner vs Carpenter - What's the Difference?".
8. ^ "Carpenter." Def. 1. *Oxford English Dictionary* Second Edition on CD-ROM (v. 4.0) © Oxford University Press 2009
9. ^ Whitney, William D., ed. "Carpenter." Def, 1. *The Century Dictionary: An Encyclopedic Lexicon of the English Language* vol. 1. New York. The Century Co. 1895. 830. Print.
10. ^ Rybní?ek, Michal; Ko?ár, Petr; Muigg, Bernhard; Peška, Jaroslav; Sedlá?ek, Radko; Tegel, Willy; Kolá?, Tomáš (2020). "World's oldest dendrochronologically dated archaeological wood construction". *Journal of Archaeological Science*. **115**: 105082. Bibcode:2020JArSc.115j5082R. doi:10.1016/j.jas.2020.105082. S2CID 213707193.
11. ^ Prosta?k, Sergio (24 December 2012). "German Archaeologists Discover World's Oldest Wooden Wells". *sci-news.com*.
12. ^ Loveday, Amos John. *The cut nail industry, 1776–1890: technology, cost accounting, and the upper Ohio Valley*. Ann Arbor, Mich.: University Microfilms International, 1979. Print.
13. ^ Jester, Thomas C.. *Twentieth-century building materials: history and conservation*. New York: McGraw-Hill, 1995. Print.
14. ^ [1] Archived April 28, 2009, at the Wayback Machine
15. ^ "United Brotherhood Of Carpenters". *carpenters.org*. Retrieved 10 April 2015.
16. ^ "Workers' Rights". *osha.gov*. Retrieved 10 April 2015.
17. ^ "Commonly Used Statistics". *osha.gov*. Retrieved 10 April 2015.
18. ^ "Safety and Health Topics - Fall Protection". *osha.gov*. Retrieved 10 April 2015.
19. ^ Lee Butler, "Patronage and the Building Arts in Tokugawa Japan", *Early Modern Japan*. Fall-Winter 2004 [2]
20. ^ "Environmentally Friendly Building Materials". *McMullen Carpenters And Joiners*. 2009-04-10. Archived from the original on 2013-06-28. Retrieved 2012-07-08.
21. ^ "A Green Home Begins with ENERGY STAR Blue" (PDF). *Energystar*. Retrieved 8 September 2012.
22. ^ "Green Building Basics". *Ciwmb.ca.gov*. Archived from the original on 2009-12-10. Retrieved 2012-05-21.
23. ^ "Defining Green-Collar Jobs" (PDF). Archived from the original (PDF) on 2011-09-27. Retrieved 2009-07-07. "There is no consensus on how to define green-collar jobs. A very broad interpretation of green jobs would include all existing and new jobs that contribute to environmental quality through improved efficiencies, better resource management, and other technologies that successfully address the environmental challenges facing society. Probably the most concise, general definition is "well-paid, career-track jobs that contribute directly to preserving or enhancing environmental quality" (Apollo Alliance 2008, 3). This definition suggests that green-collar jobs directly contribute to improving environmental quality, but would not include low-wage jobs that provide little mobility. Most discussion of green-collar jobs does not refer to positions that require a college degree, but they typically

do involve training beyond high school. Many of the positions are similar to skilled, blue-collar jobs, such as electricians, welders, carpenters, etc."

[¹]

External links



[[edit](#)]

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Look up ***carpentry*** in Wiktionary, the free dictionary.

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Wikiquote has quotations related to ***Carpentry***.

- Media related to Carpentry at Wikimedia Commons
- Carpentry at Wikibooks
- "*Carpentry*". *Encyclopædia Britannica*. Vol. 5 (11th ed.). 1911.
- The Institute of Carpenters (England)
- Carpenters entry in the *Occupational Outlook Handbook* of the Bureau of Labor Statistics of the United States Department of Labor
- Carpentry for Boys (1914). James Slough Zerbe, The New York Book Company
- v
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Woodworking

Overviews

- History
- Glossary
- Wood (lumber)

Occupations

- Boat building
- Bow and arrow
- Bush carpentry
- Cabinetry
- Caning
- Carpentry
- Certosina
- Chainsaw carving
- Chip carving
- Ébéniste
- Fretwork
- Intarsia
- Japanese carpentry
- Khatam
- Kohlrosing
- Log building
- Luthier
- Marquetry
- Millwork
- Pallet crafting
- Parquetry
- Pyrography
- Relief carving
- Root carving
- Segmented turning
- Shingle weaving
- Shipbuilding
- Spindle turning
- Timber framing
- Treen
- Whittling
- Wood carving
- Woodturning

Woods

Soft

Hard

- Cedar (*Calocedrus*, *Cedrus*)
- Cypress
- Douglas fir
- Fir
- Juniper
- Larch
- Kauri
- Pine
- Rimu
- Spruce
- Yew
- Afromosia
- Alder
- Andiroba
- Anigre
- Ash
- Apple
- Aspen
- Avodire
- Balsa
- Beech
- Bilinga
- Birch
- African Blackwood
- Australian Blackwood
- Boxwood
- Bubinga
- Camphor
- Cedrela
- Cherry
- Chestnut
- Cocobolo
- Cumaru
- Ebony
- Elm
- Eucalyptus
- Hazel
- Hickory
- Hornbeam
- Idigbo
- Imbuia
- Ipê
- Iroko
- Jarrah
- Jelutong
- Lignum vitae
- Linden (*lime*, *basswood*)
- Lova
- Merbau

- Abrasives
- Axe
- Adze
- Burnisher
- Chisel
- Drawknife
- Drill
- Fence
- Float
- Gimlet
- Gauge
- Impact driver
- Janka hardness test
- Jointer
- Mallet
- Milling machine
- Mitre box
- Rasp
- Router
- Shaper
- Sandpaper
- Square (*Carpenters, Combination, Miter, Speed, Try*)
- Thickness planer
- Timber-framing
- Veneer hammer
- Vise
- Warrington hammer
- Winding sticks
- Wood scribe
- Workbench

Clamps

- Band clamp
- C-clamp
- F-clamp
- Flooring clamp
- Gripe
- Holdfast
- Mitre clamp
- Pipe clamp
- Sawbuck
- Backsaw
- Bandsaw
- Bow
- Bucksaw
- Chainsaw
- Circular
- Compass
- Coping
- Crosscut
- Frame

Tools

| | | |
|-----------------|---------------------|-----------------------|
| Geometry | Joints | ○ Birdsmouth |
| | | ○ Biscuit |
| | | ○ Box |
| | | ○ Bridle |
| | | ○ Butt |
| | | ○ Butterfly |
| | | ○ Coping |
| | | ○ Crown of thorns |
| | | ○ Dado |
| | | ○ Dovetail |
| | | ○ Finger |
| | | ○ Groove |
| | | ○ Halved |
| | | ○ Hammer-headed tenon |
| | | ○ Knee |
| | | ○ Lap |
| | | ○ Mason's mitre |
| | ○ Miter | |
| | ○ Mortise and tenon | |
| | ○ Rabbet/Rebate | |
| | ○ Scarf | |
| | ○ Splice | |
| | ○ Tongue and groove | |
| | Profiles | ○ Bead |
| | | ○ Bevel |
| | | ○ Chamfer |
| | | ○ Ogee |
| | | ○ Ogive |
| | | ○ Ovolo |
| | | ○ Binding |
| Surface piecing | ○ Edge banding | |
| | ○ Intarsia | |
| | ○ Marquetry | |
| | ○ Oystering | |
| | ○ Parquetry | |
| | ○ Purfling | |

Treatments

- Adhesive
- French polish
- Heat bending
- Lacquer
- Oil
- Paint
- Paint stripper
- Steam bending
- Thermal
- Varnish
- Wax
- Wood drying
- Wood preservation
- Wood stain
- Wood finishing
- American Association of Woodturners
- Architectural Woodwork Institute
- British Woodworking Federation
- Building and Wood Workers' International

Organizations

- Caricature Carvers of America
- International Federation of Building and Wood Workers
- National Wood Carvers Association
- Society of Wood Engravers
- Timber Framers Guild
- Chainsaw mill

Conversion

- Hewing
- Sawmill
- Whipsaw
- Wood splitting
- Flat sawing
- Quarter sawing
- Rift sawing
- Frame and panel

Techniques

- Frameless construction
- Green woodworking

-  **Category**
-  **WikiProject**
-  **Commons**

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- **e**

Wood products

**Lumber/
timber**

- Batten
- Beam
- Bressummer
- CLS
- Cruck
- Flitch beam
- Flooring
- Joist
- Lath
- Log building
- Log cabin
- Log house
- Molding
- Panelling
- Plank
- Plate
- Post
- Purlin
- Rafter
- Railroad ties
- Reclaimed
- Shingle
- Siding
- Sill
- Stud
- Timber truss
- Treenail
- Truss
- Utility pole

- Cross-laminated timber
- Glued laminated timber
 - veneer
 - LVL
 - parallel strand
- I-joist
- Fiberboard
 - hardboard
 - Masonite
 - MDF
- Engineered wood**
- Oriented strand board
- Oriented structural straw board
- Particle board
- Plywood
- Structural insulated panel
- Wood–plastic composite
 - lumber
- Charcoal
 - biochar
- Fuelwood**
- Firelog
- Firewood
- Pellet fuel
- Wood fuel
- Cardboard
- Corrugated fiberboard
- Paper
- Fibers**
- Paperboard
- Pulp
- Pulpwood
- Rayon

| | |
|--------------------|--|
| | <ul style="list-style-type: none"> ○ Birch-tar ○ Cellulose <ul style="list-style-type: none"> ○ nano ○ Hemicellulose ○ Cellulosic ethanol ○ Dyes ○ Lignin |
| Derivatives | <ul style="list-style-type: none"> ○ Liquid smoke ○ Lye ○ Methanol ○ Pyroligneous acid ○ Pine tar ○ Pitch ○ Sandalwood oil ○ Tannin ○ Wood gas ○ Barkdust ○ Black liquor |
| By-products | <ul style="list-style-type: none"> ○ Ramial chipped wood ○ Sawdust ○ Tall oil ○ Wood flour ○ Wood wool ○ Woodchips ○ Axe ties ○ Bavin (wood) ○ Billet (wood) ○ Clapboard ○ Dugout canoe |
| Historical | <ul style="list-style-type: none"> ○ Potash ○ Sawdust brandy ○ Split-rail fence ○ Tanbark ○ Timber framing ○ Wooden masts |

- Biomass
- Certified wood
- Destructive distillation
- Dry distillation
- Engineered bamboo
- Forestry
- Green building and wood
- List of woods
- Mulch
- Non-timber forest products
- Natural building
- Papermaking
- Reclaimed lumber
- Timber recycling
- Wood drying
- Wood preservation
- Wood processing
- Woodworking
- *Yakisugi*

See also

-  **Category**
-  **Commons**
-  **WikiProject Forestry**

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Construction

Types

- Home construction
- Offshore construction
- Underground construction
 - Tunnel construction
- Architecture
- Construction

History

- Structural engineering
- Timeline of architecture
- Water supply and sanitation

Professions

- Architect
- Building engineer
- Building estimator
- Building officials
- Chartered Building Surveyor
- Civil engineer
- Civil estimator
- Clerk of works
- Project manager
- Quantity surveyor
- Site manager
- Structural engineer
- Superintendent
- Banksman
- Boilermaker
- Bricklayer
- Carpenter
- Concrete finisher
- Construction foreman
- Construction worker
- Electrician
- Glazier
- Ironworker
- Millwright
- Plasterer
- Plumber
- Roofer
- Steel fixer
- Welder

**Trades
workers
(List)**

| | |
|----------------------|---|
| | <ul style="list-style-type: none"> ○ American Institute of Constructors (AIC) ○ American Society of Civil Engineers (ASCE) ○ Asbestos Testing and Consultancy Association (ATAC) ○ Associated General Contractors of America (AGC) ○ Association of Plumbing and Heating Contractors (APHC) ○ Build UK ○ Construction History Society ○ Chartered Institution of Civil Engineering Surveyors (CICES) ○ Chartered Institute of Plumbing and Heating Engineering (CIPHE) ○ Civil Engineering Contractors Association (CECA) ○ The Concrete Society ○ Construction Management Association of America (CMAA) ○ Construction Specifications Institute (CSI) |
| Organizations | <ul style="list-style-type: none"> ○ FIDIC ○ Home Builders Federation (HBF) ○ Lighting Association ○ National Association of Home Builders (NAHB) ○ National Association of Women in Construction (NAWIC) ○ National Fire Protection Association (NFPA) ○ National Kitchen & Bath Association (NKBA) ○ National Railroad Construction and Maintenance Association (NRC) ○ National Tile Contractors Association (NTCA) ○ Railway Tie Association (RTA) ○ Royal Institution of Chartered Surveyors (RICS) ○ Scottish Building Federation (SBF) ○ Society of Construction Arbitrators |
| By country | <ul style="list-style-type: none"> ○ India ○ Iran ○ Japan ○ Romania ○ Turkey ○ United Kingdom ○ United States |
| Regulation | <ul style="list-style-type: none"> ○ Building code ○ Construction law ○ Site safety ○ Zoning |

- Architecture**
 - Style
 - List
 - Industrial architecture
 - British
 - Indigenous architecture
 - Interior architecture
 - Landscape architecture
 - Vernacular architecture
 - Architectural engineering
 - Building services engineering
 - Civil engineering
 - Coastal engineering
 - Construction engineering
 - Structural engineering
- Engineering**
 - Earthquake engineering
 - Environmental engineering
 - Geotechnical engineering
 - List
- Methods**
 - Earthbag construction
 - Modern methods of construction
 - Monocrete construction
 - Slip forming

- ## Other topics

Outline Category

- Authority control databases:** National Image not found or edit at Wikidata

1. ^ What Is Carpentry

About Environmental accounting

Environmental accounting is a subset of accounting proper, its target being to incorporate both economic and environmental information. It can be conducted at the corporate level or at the level of a national economy through the System of Integrated Environmental and Economic Accounting, a satellite system to the National Accounts of Countries^[1] (among other things, the National Accounts produce the estimates of gross domestic product otherwise known as GDP).

Environmental accounting is a field that identifies resource use, measures and communicates costs of a company's or national economic impact on the environment. Costs include costs to clean up or remediate contaminated sites, environmental fines, penalties and taxes, purchase of pollution prevention technologies and waste management costs.

An environmental accounting system consists of environmentally differentiated conventional accounting and ecological accounting. Environmentally differentiated accounting measures effects of the natural environment on a company in monetary terms. Ecological accounting measures the influence a company has on the environment, but in physical measurements.

Reasons for use

[edit]

There are several advantages environmental accounting brings to business; notably, the complete costs, including environmental remediation and long term environmental consequences and externalities can be quantified and addressed.

More information about the statistical system of environmental accounts are available here: System of Integrated Environmental and Economic Accounting.

Subfields

[edit]

Environmental accounting is organized in three sub-disciplines: global, national, and corporate environmental accounting, respectively. Corporate environmental accounting can be further sub-divided into environmental management accounting and environmental financial accounting.

- **Global environmental accounting** is an accounting methodology that deals areas includes energetics, ecology and economics at a worldwide level.
- **National environmental accounting** is an accounting approach that deals with economics on a country's level.

Internationally, environmental accounting has been formalised into the System of Integrated Environmental and Economic Accounting, known as SEEA.^[2] SEEA

grows out of the System of National Accounts. The SEEA records the flows of raw materials (water, energy, minerals, wood, etc.) from the environment to the economy, the exchanges of these materials within the economy and the returns of wastes and pollutants to the environment. Also recorded are the prices or shadow prices for these materials as are environment protection expenditures. SEEA is used by 49 countries around the world.^[3]

- **Corporate environmental accounting** focuses on the cost structure and environmental performance of a company.^[4]
- **Environmental management accounting** focuses on making internal business strategy decisions. It can be defined as:
"..the identification, collection, analysis, and use of two types of information for internal decision making:
 - 1) Physical information on the use, flows and fates of energy, water and materials (including wastes) and
 - 2) Monetary information on environmentally related costs, earnings and savings."^[5]

As part of an environmental management accounting project in the State of Victoria, Australia, four case studies were undertaken in 2002 involving a school (Methodist Ladies College, Perth), plastics manufacturing company (Cormack Manufacturing Pty Ltd, Sydney), provider of office services (a service division of AMP, Australia wide) and wool processing (GH Michell & Sons Pty Ltd, Adelaide). Four major accounting professionals and firms were involved in the project; KPMG (Melbourne), Price Waterhouse Coopers (Sydney), Professor Craig Deegan, RMIT University (Melbourne) and BDO Consultants Pty Ltd (Perth). In February 2003, John Thwaites, The Victorian Minister for the Environment launched the report which summarised the results of the studies.^[1]

These studies were supported by the Department of Environment and Heritage of the Australian Federal Government, and appear to have applied some of the principles outlined in the United Nations Division for Sustainable Development publication, *Environmental Management Accounting Procedures and Principles* (2001).
- **Environmental financial accounting** is used to provide information needed by external stakeholders on a company's financial performance. This type of accounting allows companies to prepare financial reports for investors, lenders and other interested parties.^[6]
- **Certified emission reductions (CERs) accounting** comprises the recognition, the non-monetary and monetary evaluation and the monitoring of Certified emission reductions (CERs) and GHGs (greenhouse gases) emissions on all levels of the value chain and the recognition, evaluation and monitoring of the effects of these emissions credits on the carbon cycle of ecosystems.^[2]

[3]

Companies specialised in Environmental Accounting

[edit]

- NEMS AS

Examples of software

[edit]

- EHS Data's Environmental and Sustainability Accounting and Management System
- Emisoft's Total Environmental Accounting and Management System (TEAMS)
- NEMS's NEMS Accounter

Examples of software as a service

[edit]

- Greenbase Online Environmental Accountancy

See also

[edit]

- icon **Business and economics portal**
- icon **Ecology portal**
- icon **Environment portal**
- Anthropogenic metabolism
- Carbon accounting
- Defensive expenditures
- Ecological economics
- Ecosystem services
- Emergy synthesis
- Environmental data
- Environmental economics
- Environmental enterprise
- Environmental finance
- Environmental monitoring
- Environmental management system
- Environmental pricing reform
- Environmental profit and loss account
- Fiscal environmentalism
- Full cost accounting (FCA)
- Greenhouse gas emissions accounting
- Industrial metabolism
- Material flow accounting
- Material flow analysis
- Monitoring Certification Scheme
- Social metabolism
- Sustainability accounting
- System of Integrated Environmental and Economic Accounting
- Urban metabolism

References

[edit]

Notes

[edit]

1. ^ *"Handbook of National Accounting: Integrated Environmental and Economic Accounting 2003" (PDF)*. United Nations, European Commission, International Monetary Fund, Organisation for Economic Co-operation and Development and World Bank. Archived from the original (PDF) on 2011-06-01. Retrieved 2013-05-02.
2. ^ *"Glossary of terminology and definitions"*. Environmental Agency, UK. Archived from the original on 2006-08-03. Retrieved 2006-05-25.
3. ^ Environmental Protection Agency (1995). *"An introduction to environmental accounting as a business management tool: Key concepts and terms"*. United States Environmental Protection Agency.
4. ^ Jasch, C. (2006). *"How to perform an environmental management cost assessment in one day"*. *Journal of Cleaner Production*. **14** (14): 1194–1213. doi:10.1016/j.jclepro.2005.08.005.
5. ^ *"Handbook of National Accounting: Integrated Environmental and Economic Accounting 2003" (PDF)*. United Nations, European Commission, International Monetary Fund, Organisation for Economic Co-operation and Development and World Bank. Archived from the original (PDF) on 2011-06-01. Retrieved 2013-05-02.
6. ^ *"Global Assessment of Environment Statistics and Environmental-Economic Accounting 2007" (PDF)*. United Nations.

Footnotes

[edit]

1. ^ Environmental Management Accounting: An Introduction and Case Studies (Adobe PDF file, 446KB)
2. ^ Kumar, P. and Firoz, M. (2019), "Accounting for certified emission reductions (CERs) in India: An analysis of the disclosure and reporting practices within the financial statements", *Meditari Accountancy Research*.
<https://doi.org/10.1108/MEDAR-01-2019-0428>
3. ^ Bolat, Dorris, M. *"German Accounting"*. Retrieved 17 November 2021.cite news: CS1 maint: multiple names: authors list (link)

Further reading

[edit]

- Odum, H.T. (1996) *Environmental Accounting: Energy and Environmental Decision Making*, Wiley, U.S.A.
- Tennenbaum, S.E. (1988) *Network Energy Expenditures for Subsystem Production*, MS Thesis. Gainesville, FL: University of FL, 131 pp. (CFW-88-08)

External links

[edit]

- United Nations Environmental Accounting
- Green Accounting for Indian States Project
- Environmental MBA Degree Info
- Environmental Accounting in Austria (Information about environmental accounts, structure, methods, legal basis, scope and application)
- Environmental Management Accounting (EMA) Project Archived 2012-04-30 at the Wayback Machine, Victoria, Australia

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Sustainability

- Outline
- Index

Principles

- Anthropocene
- Environmentalism
- Global governance
- Human impact on the environment
- Planetary boundaries
- Development

| | |
|-------------------------|--|
| Consumption | <ul style="list-style-type: none"> ○ Anthropization ○ Anti-consumerism ○ Circular economy ○ Durable good ○ Earth Overshoot Day ○ Ecological footprint ○ Ethical ○ Green consumption ○ Micro-sustainability ○ Over-consumption ○ Product stewardship ○ Simple living ○ Social return on investment ○ Steady-state economy ○ Sustainability <ul style="list-style-type: none"> ○ Advertising ○ Brand ○ Marketing myopia ○ Sustainable <ul style="list-style-type: none"> ○ Consumer behaviour ○ Market ○ Systemic change resistance ○ Tragedy of the commons ○ Control ○ Demographic transition ○ Dependency ratio <ul style="list-style-type: none"> ○ List |
| World population | <ul style="list-style-type: none"> ○ Family planning ○ Intergenerational equity ○ Population ageing ○ Sustainable population ○ Appropriate ○ Environmental technology ○ Natural building |
| Technology | <ul style="list-style-type: none"> ○ Sustainable architecture ○ Sustainable design ○ Sustainable industries ○ Sustainable packaging ○ Biosecurity ○ Biosphere |
| Biodiversity | <ul style="list-style-type: none"> ○ Conservation biology ○ Endangered species ○ Holocene extinction ○ Invasive species |

Energy

- Carbon footprint
- Renewable energy
- Sustainable energy
- Civic agriculture
- Climate-smart agriculture
- Community-supported agriculture

Food

- Cultured meat
- Sustainable agriculture
- Sustainable diet
- Sustainable fishery
- Air well (condenser)
- Bioretention
- Bioswale
- Blue roof
- Catchwater
- Constructed wetland
- Detention basin
- Dew pond
- Footprint
- Hydroelectricity
- Hydropower
- Infiltration basin
- Irrigation tank
- Marine energy
- Micro hydro
- Ocean thermal energy conversion

Water

- Pico hydro
- Rain garden
- Rainwater harvesting
- Rainwater tank
- Reclaimed water
- Retention basin
- Run-of-the-river hydroelectricity
- Scarcity
- Security
- Small hydro
- Sustainable drainage system
- Tidal power
- Tidal stream generator
- Tree box filter
- Water conservation
- Water heat recycling
- Water recycling shower
- Water-sensitive urban design

Accountability

- Corporate environmental responsibility
- Corporate social responsibility
- Environmental accounting
- Environmental full-cost accounting
- Environmental planning
- Sustainability
 - Accounting
 - Measurement
 - Metrics and indices
 - Reporting
 - Standards and certification
- Sustainable yield



Applications

- Advertising
- Art
- Business
- City
- Climate finance
- Community
- Disinvestment
- Eco-capitalism
- Eco-cities
- Eco-investing
- Eco-socialism
- Ecovillage
- Environmental finance
- Green economy
 - Construction
 - Fashion
 - Finance
- Gardening
- Geopark
- Green
 - Development
 - Infrastructure
 - Marketing
- Green roof
- Greening
- Impact investing
- Landscape
- Livelihood
- Living
- Market
- Organic movement
- Organizations
- Procurement
- Refurbishment
- Socially responsible business
- Socially responsible marketing
- Sanitation
- Sourcing
- Space
- Sustainability organization
- Tourism
- Transport
- Urban drainage systems
- Urban infrastructure

Sustainable management

- Environmental
- Fisheries
- Forest
- Humanistic capitalism
- Landscape
- Materials
- Natural resource
- Planetary
- Recycling
- Waste
- UN Conference on the Human Environment (Stockholm 1972)
- Brundtlandt Commission Report (1983)
- *Our Common Future* (1987)
- Earth Summit (1992)
- Rio Declaration on Environment and Development (1992)
- Agenda 21 (1992)
- Convention on Biological Diversity (1992)
- Lisbon Principles (1997)
- Earth Charter (2000)
- UN Millennium Declaration (2000)
- Earth Summit 2002 (Rio+10, Johannesburg)
- UN Conference on Sustainable Development (Rio+20, 2012)
- Sustainable Development Goals (2015)

Agreements and conferences

-  **Category**
-  **Lists**
- **Science**
- **Studies**
- **Degrees**

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Social and environmental accountability

Ethics and principles

- Aarhus Convention
- Climate justice
- Corporate accountability / behaviour / environmental responsibility / responsibility / social responsibility
- Dirty hands
- Environmental racism / in Russia / in the United States / in Western Europe / inequality in the UK / injustice in Europe
- Ethical banking
- Ethical code
- Extended producer responsibility
- Externality
- Harm
- Little Eichmanns
- Loss and damage
- Organizational ethics
- Organizational justice
- Pollution
- Principles for Responsible Investment
- Racism
- Social impact assessment
- Social justice
- Social responsibility
- Stakeholder theory
- Sullivan principles
- Transparency (behavioral social)
- UN Global Compact
- Corporate crime
- Double bottom line
- Ethical positioning index
- Higg Index
- Impact assessment (environmental equality social)
- ISO 26000
- ISO 45001
- Genuine progress indicator
- Performance indicator
- SA 8000
- OHSAS 18001
- Social return on investment
- Whole-life cost

Social accounting

Clean up after the Exxon

Image not found or type unknown

**Environmental
accounting**

- Carbon accounting
 - Eco-Management and Audit Scheme
 - Emission inventory
 - Environmental full-cost accounting /
Environmental conflict / impact assessment /
management system / profit-and-loss account
 - ISO 14000
 - ISO 14031
 - Life-cycle assessment
 - Pollutant release and transfer register
 - Sustainability accounting / measurement / metrics
and indices / standards and certification / supply
chain
 - Toxics Release Inventory
 - Triple bottom line
 - Global Reporting Initiative
- Reporting**
- GxP guidelines
 - Sustainability reporting
 - Community-based monitoring
- Auditing**
- Environmental (certification)
 - Fair trade (certification)
 - ISO 19011

- Bangladesh Accord
- Benefit corporation
- Child labour
- Community interest company
- Conflict of interest
- Disasters
- Disinvestment
- Eco-labeling
- Environmental degradation
- Environmental pricing reform
- Environmental, social, and corporate governance
- Ethical consumerism
- Euthenics
- Global justice movement
- Health impact assessment
- Market governance mechanism
- Product certification
- Public participation
- SDG Publishers Compact
- Social enterprise
- Socially responsible business
- Socially responsible investing
- Socially responsible marketing
- Stakeholder (engagement)
- Supply chain management

Related

-  Environment portal
-  Category
-  Commons
- Organizations

Authority control databases: National  Japan  Edit this at Wikidata  Czech Republic

About CREATIVE BUILDING SUPPLIES LTD

Driving Directions in Winnipeg

Driving Directions From 49.899423435167, -97.127606434373 to CREATIVE BUILDING SUPPLIES LTD

**Driving Directions From 49.915661697178, -97.14173457459 to CREATIVE BUILDING
SUPPLIES LTD**

**Driving Directions From 49.907942419987, -97.207544683779 to CREATIVE BUILDING
SUPPLIES LTD**

**Driving Directions From 49.915632476927, -97.230464365318 to CREATIVE BUILDING
SUPPLIES LTD**

**Driving Directions From 49.927834829499, -97.170612807563 to CREATIVE BUILDING
SUPPLIES LTD**

**Driving Directions From 49.914096346256, -97.199420604614 to CREATIVE BUILDING
SUPPLIES LTD**

**Driving Directions From 49.904707139063, -97.179514520946 to CREATIVE BUILDING
SUPPLIES LTD**

**Driving Directions From 49.903457345015, -97.150196510204 to CREATIVE BUILDING
SUPPLIES LTD**

**Driving Directions From 49.907190575925, -97.249483578713 to CREATIVE BUILDING
SUPPLIES LTD**

**Driving Directions From 49.878622511595, -97.250255744591 to CREATIVE BUILDING
SUPPLIES LTD**

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Frequently Asked Questions

How is embodied carbon calculated for building materials from quarry to site?

Embodied carbon is calculated by summing the greenhouse gas emissions associated with each stage of a materials lifecycle, from extraction at the quarry, through processing and manufacturing, transportation to the site, and installation. This involves collecting data on energy use and emissions at each step and converting it into a carbon dioxide equivalent (CO₂e) value.

What are the key factors that influence the embodied carbon of building materials during transportation?

The key factors include the distance between the quarry and the construction site, the mode of transportation used (e.g., road, rail, or sea), the fuel efficiency of transport vehicles, and the weight and volume of materials being transported. Optimizing these factors can significantly reduce embodied carbon emissions.

How can construction companies reduce embodied carbon from quarry to site?

Construction companies can reduce embodied carbon by sourcing materials locally to minimize transport distances, choosing materials with lower embodied carbon intensities, optimizing logistics to increase transport efficiency (e.g., using backhauling), and adopting low-carbon transport methods such as electric or hybrid vehicles. Additionally, selecting suppliers committed to sustainable practices can further decrease overall emissions.

Measuring Embodied Carbon from Quarry to Site

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