legal issues of interest to structural engineers

Emerging Risks of Green Construction

Will LEED® Lead Construction Professionals To Court More Often? By Russ A. Brinson and James B. Dolan, Jr.



We all know the old adage, "Be careful what you ask for, because you just might get it." In the new, ever-changing world of green construction, structural engineers must be careful what clients request and what they expect from a green construction project.

The demand for green construction is pulling ahead of the abilities of most engineers and others in the construction industry. Because of this demand, and the revenue it promises, everyone is scrambling to get educated, find new products and develop different ways to build green.

Anticipating risk is extremely important, as the industry has learned the hard way. It was too late when the construction world was put on notice by the onslaught of litigation over stucco/EFIS because of moisture intrusion and failures of polybutylene piping systems.

As a result, this article seeks to identify the potential legal issues of green construction. Standing out from the crowd as possible sources of litigation are the Leadership in Energy and Environmental Design (LEED®) rating system, expanded warranty and breach of contract disputes, and potential liabilities arising from new and untested products and technologies.

LEED Certification

The LEED rating system focuses on environmental impact and energy efficiency.

With increasing frequency, property developers are demanding LEED-certified buildings, whether to take advantage of potential operational cost savings through resource conservation, or to foster an image of being on the vanguard of a growing environmental consciousness. Builders are being pressured to promise LEED-certified construction, and engineers and architects are being asked to present design specifications for these green buildings. These demands and pressures can give rise to risks beyond those associated with projects using standard designs and methods.

The process of getting LEED certification can be complex and very time-consuming. Although it is difficult to take the time to become properly educated on LEED ratings and emerging trends in green construction, it is essential to invest that time now, before falling further behind, as more clients are looking for LEED-accredited professionals. To learn more about becoming LEED accredited, go to www.usgbc.org/DisplayPage. aspx?CMSPageID=1584.

Before taking part in green building, make sure that a written plan is in place to obtain LEED certification for the project, and be sure that the contract documents clearly express which party or parties will be responsible for working to achieve LEED certification. The plan should also make clear the consequences of failing to achieve LEED certification.

Warranty and Contract Issues

Perhaps to justify what is perceived as the increased "up-front" cost of green construction, property developers are demanding additional contractual provisions and warranties regarding the energy efficiency of green buildings and their environmental impact. Naturally, demands for additional contract terms and warranties pose potential pitfalls for construction professionals.

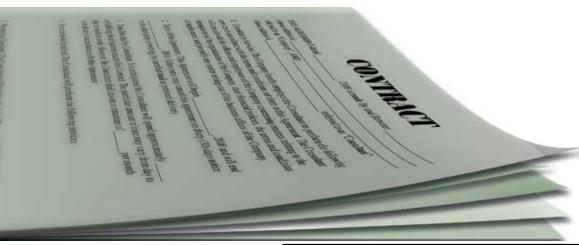
Claims for breaches of contract and warranty will emerge from a project's failure to reach certain energy efficiency goals and obtain the desired level of LEED certification. Moreover, claims for breach of implied warranty may arise based on representations made in marketing materials regarding services provided in connection with green construction, the quality of those services, and what the purchaser could expect to receive from those services.

Manage these risks by setting forth in writing the duties and responsibilities of each member of the design and construction team. Clearly defining roles and performance expectations will help to avoid confusion and minimize risks. In addition, marketing materials should avoid vague representations regarding performance, and should limit such statements to those that can be quantified.

New Products and **Technologies**

New products and technologies are being developed to meet the increasing demand for green construction. They can become problematic, as most have been developed quickly with limited field testing, and disputes can arise regarding who bears the risk of failure or poor performance. Although sustainability is an important aspect of LEED certification, unfortunately most "green friendly" products are in their infancy in terms of field testing.

Lack of field testing has led to and will continue to lead to product failure. Only time will tell whether the new "green friendly" products and technologies will actually perform as promised. Engineers must learn as much as possible about these new products and technologies, and be very





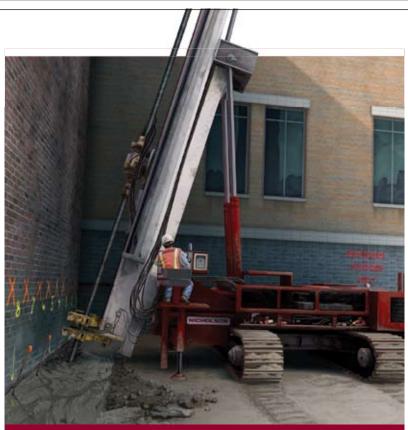
careful when recommending or using them as part of a green construction project. Although product failure is normally the responsibility of the manufacturer, engineers may also face potential liability for selecting these new, unproven products and for deeming them suitable and acceptable alternatives to proven products that are less "green friendly."

Claims arising from the failure of emerging green technologies and products selected or recommended by the engineer may be avoided when the contract documents expressly state that such products or technologies are new, and that their selection or recommendation does not constitute a warranty of performance. As an alternative, the contract documents could clearly spell out who is responsible for the selection of products and technologies to be used, so that the parties can adequately address the risks assumed and plan accordingly, including cost estimates.

Conclusion

While green construction brings exciting new opportunities and rewards, it also brings a host of risks. Education and careful communication are the keys to limiting liability. With proper training on green construction and new products, many risks can be avoided. Similarly, with proper communication of the risks, articulation of responsibilities, and management of client expectations, many of the legal risks associated with green construction can be minimized or eliminated.

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