

Density Bonus

POLICY OBJECTIVE

To create an incentive for developers to incorporate green building practices and/or achieve specified local sustainability objectives by permitting additional floor space above the permitted zoning for qualified projects.

DESCRIPTION

Seattle's current Density Bonus program is focused on the downtown area and is tied to the LEED® certification system. It awards progressively higher LEED® certifications with higher Floor-to-Area ratio (FAR) increases. The policy will shift its geographic focus to in areas outside of downtown at the end of the year. This policy will have a similar design and focus.

SUMMARY RATINGS (★★★★★ = best/most feasible)

ENERGY EFFICIENCY POTENTIAL

★★

COST EFFECTIVENESS

★★★★★

ECONOMIC BENEFIT

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ADMINISTRATIVE FEASIBILITY

★★★★

COST OF POLICY IMPLEMENTATION

★★★

ENERGY EFFICIENCY POTENTIAL

★★

Long-term energy savings potential is high at the project level, though overall impact on energy efficiency in new construction dependent on policy uptake.

- **Policy uptake is likely to be high in areas that can support density:** Policy should not be uniformly applied throughout the city, but focus in on areas that can support increased density. Consequently, the policy has a ceiling on its policy uptake (% of new construction affected) due to geographical constraints.
- **Cumulative energy savings of approximately 1,100,000 – 1,400,000 MWhr for new construction through 2030:** One critical piece of the policy design will be the financial incentive – the FAR increase which would meet development density goals and incentivize developers to achieve higher levels of energy efficiency. If the marginal increase in development costs are high from building at higher densities, and lease rates or sales values are low, then developer participation will also be low. To maximize energy savings, the policy design should specify achievable energy efficiency standards (likely on the order of LEED® Silver) and attractive FAR incentives (ranging from 0.2 to 0.4) for each typical building type and size.
- **Consistent with targets outlined in 2030 Challenge targets:** The Seattle Density Bonus program is already tied to LEED® certification standards. To meet the 2030 Challenge goals, Seattle should consider prescribing specific energy performance credits and/or local sustainability criteria as an additional program qualification prerequisite. Monitoring of policy adoption over time will also be important in assessing the policy's compatibility with the 2030 Challenge.

ECONOMIC IMPACTS

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There is limited potential for new job creation, but some positive economic impact could result from higher density developments with high performance buildings.

- **Limited impact on job market due to narrow target market within new construction:** The policy would primarily support existing green building professionals and impact the green building industry.
- **Lower-income areas could benefit from green projects:** Strategically prioritizing projects located in lower-income neighborhoods or business districts could give residents in energy efficient homes more discretionary income through lower utility bills and reduced transportation costs through access to transit and employment if the density bonus is realized along transit corridors.

COST OF POLICY IMPLEMENTATION

★★★

City of Seattle Density Bonus program adds only marginal, if any, costs to the City, but may require additional planning staff if the program were widely adopted by the development community.

- **Program will not likely require additional funding from the City, as the policy can draw on existing program:** The Seattle Density Bonus is in place, though it expects to change its geographical focus in 2009. If the project

- expands to accommodate a large project flow, then it may be necessary to hire additional staff to oversee the project.
- **Program qualification may result in cost increases for the developer, though increase rentable floor space should more than offset the costs:** Developers that elect to pursue the Density Bonus program, the marginal cost of developing green would most likely be less than the benefit that they receive in financial gains.
- **Program could result in cost increases for City due to increased demand for infrastructure, services, and transit**
- **Policy could strengthen the business case for green buildings in Seattle**

COST EFFECTIVENESS

★★★★★

The cost-benefit analysis indicates that program is effective for the City and financially advantageous for the developer. Policy uptake limitations due to geography place a ceiling on the cost effectiveness.

- **Direct City Benefit Cost ~5.0** \$5.00 of energy savings per \$1.00 of program costs to the city
- **Direct Developer Benefit Cost ~8.1:** \$8.10 of financial benefit to developer per \$1.00 of developer costs
- **Net Benefit Cost ~7.9:** \$7.90 of monetized energy savings and financial benefit to developer for every \$1.00 of costs to the city and developer. Direct monetized energy savings are calculated assuming 9-20% developer participation. This would imply that the program is highly desirable for developers which specialize in buildings that can support additional floor area easily.
- **Cost per MWhr saved low:** ~\$4.67 per MWhr saved

ADMINISTRATIVE FEASIBILITY

★★★★★

City of Seattle's pilot program provides a programmatic infrastructure and experience, in order to easily adapt the policy to target different building types, sizes, and locations, or have different goals.

- **Little difficulty in initiating policy:** The policy already exists in Seattle, though it is being expanded.
- **Good program flexibility:** Seattle could include either credits from the Energy and Atmosphere section of LEED® or local sustainability criteria in order to adapt the program to different program targets.
- **Policy needs enforcement mechanism such as a bond requirement**
- **Seattle staff already trained in LEED®**

STAKEHOLDER IMPACTS

- **Additional financing offsets the expected project cost increases:** Allowing additional floor area may incentivize innovative green building strategies and technologies that would otherwise have been removed from the project due to financing constraints.
- **Good synergy with existing SCL/PSE policies:** The Density Bonus program is designed to promote innovation in energy efficiency practices that go beyond current energy code, similar to SCL and PSE's programs.

LESSONS LEARNED

PROS

- Cost effective policy – low program costs (low cost to City and large net benefit to developer) for the energy savings benefits
- Few new resources or staffing requirements are needed to implement policy, depending on policy uptake
- High potential for providing visible models of high performance and sustainable development for Seattle developers

CONS

- May require stringent enforcement mechanism such as a bond
- Need for careful planning and community engagement in selecting areas
- Difficult to incentivize development beyond the basic threshold requirements of the program
- Policy may not be as effective in addressing residential developers

CONSIDERATIONS IN POLICY DESIGN

- Threshold building performance – appropriateness of including LEED® credits or local sustainability requirements
- Target of policy – project building type/size, target policy adoption, which end of the green building spectrum
- Geographic focus on the density bonus program within City of Seattle
- Inclusion of an enforcement mechanism such as a bond program to ensure program compliance