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## RE: THE PHFA PROJECT: A Net-Zero-Energy National Agenda

In the Spring of 2014 a group of approximately 25 “stakeholders”, composed of affordable housing developers, representatives from the Sustainability, Housing Authority and Mayor’s offices of Philadelphia and Pittsburgh, educators from Temple, Carnegie Mellon and Penn State Universities, as well as Passive House architects, designers and builders gathered to meet in Harrisburg to make a bold proposition to PHFA, the Pennsylvania Housing Finance Agency: **Initiate a project that would have all affordable housing in Pennsylvania be designed and constructed to a Net-Zero-Energy-Capable standard by 2030.** The “tool” proposed to achieve this was *Passive House* (a building standard initiated in Germany but established in the US – see [www.passivehouseacademy.com](http://www.passivehouseacademy.com), or [www.phius.org](http://www.phius.org) - that is designed to radically reduce energy consumption in buildings by up to 90%). PHFA had been interested in “raising the bar” with respect to energy efficiency as developers had been surpassing their standards for years. PHFA welcomed the challenge and within 4 months put the project in motion by introducing language into their 2015 Qualified Allocation Plan which incentivizes developers interested in LIHTC funding to design/construct their projects to meet the rigorous Passive House Standard. To do this, they created a new category, worth 10 points, for “*Passive House Certification*”. The LIHTC application is a point-based system and extremely competitive. Because PHFA funds only 25% of all project applications each year (based primarily on highest point scores), the interest from developers has been enormous.

After the first round of applications, **42% of the applications applied with the “Passive House points”**. The average cost of construction between all Passive House projects across the State was projected at \$171/sf, a “negligible” (PHFA’s words) difference from the previous year’s applications. Out of the 39 projects which were awarded funding in 2015, seven of them will be Passive House projects which means that Pennsylvania is in the midst of initiating the largest concentration of Passive House/Net-Zero-Energy-Capable dwelling units (422 units) in the country in 2015. This is a momentous shift in both the awareness and adoption of Passive House/Net-Zero-Energy-Capable design and building principles within the development community, particularly in Pennsylvania but steadily growing beyond, within the FIRST year of this 15-year project. And while this project is initially limited to the “affordable housing” sector, it is designed to train precisely the same design and building professionals responsible for the “market-rate housing” sector. As such, The PHFA Project is really a catalyst for radical and significant market penetration of Passive House/Net-Zero-Energy-Capable housing design not just in Pennsylvania but throughout the country, which is why the PHFA Project has taken on a Net-Zero-Energy National Agenda. I’m currently in contact with the HFAs of 34 other States to see how and trying to build a network that can support this effort.

What is most remarkable about the PHFA project as it relates to all other HFAs, is how PHFA introduced the most rigorous high-performance building standard in the world to its development community as an OPTION - not new policy but in a creative and “a-political” manner - and how the community has responded. All of PHFA’s other initiatives remained in tact and untouched within their QAP, as a separate and new 10 point category for “Passive House Certification” was introduced, so there was no conflict with Enterprise Green Communities criteria, Green Globes, Energy Star, etc. I would like to discuss further with the North Carolina Housing Finance Agency how North Carolina may participate and benefit from this project. Please call me at the number above. Thank you for your time.

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