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Dr. Kristina Thayer

NIEHS

Research Triangle Park, NC 27709

Dear Dr. Thayer:

I am writing to express my support and concerns about the recommendations of the NIEHS Panel on Children's Environmental Health and Disease Prevention Research Program.

Since 1999 I have collaborated as a part of the Johns Hopkins Center for Childhood Asthma in the Urban Environment (CCAUE). I am currently the Director of this Center. My research and collaborations as a part of this Center have been the most rewarding activity of my research career and I strongly recommend the continuation of this funding. The portfolio of research findings from the previously funded and existing Centers is impressive and speaks for itself.

I agree with the panel's conclusion that the Children's Centers should include a strong basic science component. Our Center at Johns Hopkins has tried to maintain a balance between basic science and community-based epidemiological research. As I recall, Children's Centers were always expected to include both basic and applied research so I see this recommendation as simply affirming the original model. I therefore think it is reasonable to expect Children's Centers to include both. I do not think one type of research has to come at the expense of the other, however. In fact, basic science that is nested within, or closely integrated with, population-based outcome studies is an efficient way to advance the field of environmental health.

I strongly disagree with the review panel's proposals with regard to the funding mechanism. A good center is more than a collection of separate R01s. This notion appears to be lost in the panel's report. In order to be tightly integrated and focused - with good interaction between basic and applied research, and support cores - Center grants need to be developed around a theme, with a common mission and integrated goals. They should be conceived and reviewed as a single entity rather than a collection of projects. I think each project within a Center should be held to the same standard of review as an R01, but should not necessarily be expected to compete as a stand alone grant. The strength and value of a given project may, in some cases, be a product of

synergism with other projects within a Center. This would not be evident if the grant were an independent R01. A Center without a sufficient number (defined by NIEHS) of quality studies should not be funded. According to this model, a Center should not be a life-support system for a single large project, whether it is mechanistic or epidemiologic.

A potential weakness of the NIEHS-proposed funding approach is that institutions will attempt to define a Center around individually funded grants that are not tightly integrated. This will result in Center proposals that lack integration and a common mission. I fear there will be little or no synergism with this approach, and Centers will be nothing more than the sum of their individual parts without any clear advantage to being integrated with other related projects.

I strongly agree with the notion that Centers should have a pilot project component and I support adding a training component.

I am a strong supporter of community-based participatory research (CBPR). While I support the notion that CBPR be optional, I think it should be highly encouraged. I disagree with the Panel's notion that CBPR studies limit the Center's impact to questions that are only regionally relevant. While CBPR studies include community concerns, these concerns are often of national or international relevance. I would argue that a proposed CPBR study needs to justify its focus based on local and national relevance and let the peer reviewer's of the grant judge those studies with broader relevance as being more "significant".

I agree with the review panel's observation that current Centers cover a relatively narrow range of issues. This is not a Center problem however. The NIEHS can increase the range of diseases and issues that Centers will propose to address by changing the introduction to their request for proposals. One could probably argue that, with the exception of cancer, respiratory and neurobehavioral outcomes represent the largest fraction of environmentally-relevant childhood diseases. While I would not have a problem with expanding research Centers to include cancer outcomes, I would note that there are other Institutes that support childhood cancer research.

I hope the above critique is helpful and would like to thank NIEHS for their support of our important research.

Sincerely,

A handwritten signature in black ink that reads "Patrick N. Breyse". The signature is written in a cursive, slightly slanted style.

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