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Daejeon, February 11, 2016

Mr. Lindley N. Johnson  
Planetary Defense Coordination Officer  
Planetary Science Division  
Science Mission Directorate  
NASA Headquarters  
Washington, DC 20546  
USA

International Asteroid Warning Network (IAWN)

Dear Mr. Johnson,

On behalf of Korea Astronomy and Space Science Institute (KASI), I am pleased to inform you that KASI is willing to participate in the International Asteroid Warning Network (IAWN), in order to support the work of the United Nations Committee on the Peaceful Uses of Outer Space (COPUOS). To this end, I am sending you the attached Statement of Intent.

I would also like to designate Dr. Hong-Kyu Moon, Senior Researcher of the Space Science Division in my institute, as the KASI representative for IAWN activities. KASI offers NEO observation efforts utilizing KMTNet (Korea Microlensing Telescope Network) as detailed in the appendix.

Sincerely yours,

Inwool Han

President, Korea Astronomy and Space Science Institute

## Appendix: Korea Astronomy and Space Science Institute's participation in IAWN

KASI guarantees telescope time of KMTNet (Korea Microlensing Telescope Network) for the survey and physical characterization of small Solar System bodies during the period between 2015 and 2019. The network time allocated for observation of the population will be 135 full nights a year.

Through 'Deep Ecliptic Patrol of the Southern Sky' (DEEP-South) project, KASI is targeting km-sized Potentially Hazardous Asteroids (PHAs) for physical characterization in early stage, and this will be extended to sub-km NEOs in later stages. KMTNet will also be used to scan the sky at lower solar elongations for discovery and follow-up of Atens and Atiras every early morning and in the evening.

When the Minor Planet Center (MPC) reports the need for urgent follow-up of a potential impactor, KASI will facilitate the work to be done utilizing the round-the-clock operation capability of KMTNet to support the activities of the International Asteroid Warning Network (IAWN).

### *KMTNet contribution of NEO Survey and Characterization to IAWN efforts*

Facility	Location	Observation	Contributions
<b>Korea Microlensing Telescope Network (KMTNet)</b>  Three identical 1.6 m aperture optical telescopes equipped with 18k×18k mosaic CCDs	<b>CTIO</b> , Cerro Tololo, Chile  <b>SAAO</b> , Sutherland, South Africa  <b>SSO</b> , Siding Spring, Australia	Physical characterization and discovery	Orbit, albedo, spin period, spin states, shape models, [crude] compositional knowledge

\* KMTNet is a dedicated network of telescopes with its primary purpose being the search for and characterization of extrasolar planets using microlensing. During the period of 2015-2019, part of the telescope time has been allocated to Near Earth Object studies.