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(71) Applicants (for all designated States except US): **LG CHEM, LTD.** [KR/KR]; 20, Yoido-dong, Youngdungpo-gu, Seoul 150-721 (KR). **IUCF-HYU (Industry-University Cooperation Foundation Hanyang University)** [KR/KR]; 17 Haengdang-dong, Seongdong-gu, Seoul 133-791 (KR).

(72) Inventors; and

(75) Inventors/Applicants (for US only): **HAN, Yang-Kyoo** [KR/KR]; 309-301, Hyoseong Whauntville Apt., Gongneung 2-dong, Nowon-gu, Seoul 139-853 (KR). **LEE, Je-Gwon** [KR/KR]; 106-401, Kolon Haneulchae Apt., Yeonnam-dong, Mapo-gu, Seoul 121-770 (KR). **KIM, Su-Hwa** [KR/KR]; #210, Nagwon Villa, Eunhaeng 2-dong, Jungwon-gu, Seongnam-si, Gyeonggi-do 462-152 (KR).

(74) Agent: **YOU ME PATENT AND LAW FIRM**; Seolim Bldg., 649-10 Yoksam-dong, Kangnam-ku, Seoul 135-080 (KR).

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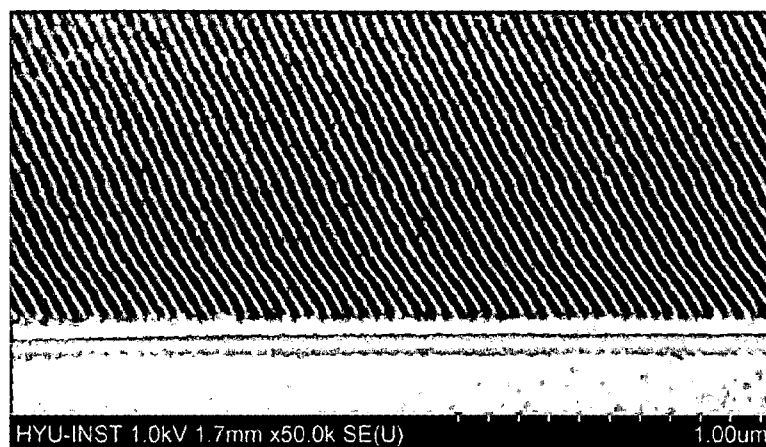
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(54) Title: NOVEL DIBLOCK COPOLYMER, PREPARATION METHOD THEREOF, AND METHOD OF FORMING NANO PATTERN USING THE SAME

FIG. 4c



(57) Abstract: The present invention relates to a diblock copolymer that may facilitate formation of a finer nano pattern, and be used for manufacture of an electronic device including a nano pattern or a bio sensor, and the like, a method for preparing the same, and a method for forming a nano pattern using the same. The diblock copolymer comprises a hard segment including at least one specific acrylamide-based repeat unit, and a soft segment including at least one (meth)acrylate-based repeat unit.



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A. CLASSIFICATION OF SUBJECT MATTER*C08F 297/00(2006.01)i, C08F 220/10(2006.01)i, C08F 220/54(2006.01)i, G03F 7/00(2006.01)i, C08J 5/18(2006.01)i*

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

C08F 297/00

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

eKOMPASS(KIPO internal) & Keywords: acrylic diblock copolymer, acrylamide hard segment, soft segment, RAFT polymerization

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	J. K. Lee et al. 'Synthesis of Novel DPAA Based Block Copolymers by RAFT Polymerizations and Their Morphology Control.' In: Abstract for Annual Meeting of the Polymer Society of Korea, 2009.	1-20
A	See the whole document.	21-23
X	J. K. Lee et al. 'Preparation of Novel n-BA / DPAA Block Copolymers by RAFT Polymerization and Their Morphological Properties.' In: Abstract for Annual Meeting of the Polymer Society of Korea, 2008.	1-20
A	See the whole document.	21-23
X	J. K. Lee et al. 'Synthesis and Characterization of New Block Copolymers with PDPAA Hard Block and Poly(n-butyl acrylate) Soft Block Using RAFT Polymerization.'	1-20
A	In: Abstract for Annual Meeting of the Polymer Society of Korea, 2008. See the whole document.	21-23



Further documents are listed in the continuation of Box C.



See patent family annex.

* Special categories of cited documents:

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Korean Intellectual Property Office
189 Cheongsu-ro, Seo-gu, Daejeon Metropolitan
City, 302-701, Republic of Korea

Facsimile No. 82-42-472-7140

Authorized officer

Jung Doo Young

Telephone No. 82-42-481-8699



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C (Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT		
Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	J. K. Lee et al. 'Synthesis and Characterization of New Diblock Copolymers from n-Butyl Acrylate and DPAA by RAFT Polymerization.' In: Abstract for Annual Meeting of the Polymer Society of Korea, 2007.	1-20
A	See the whole document.	21-23

INTERNATIONAL SEARCH REPORT

Information on patent family members

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PCT/KR2012/001927Patent document
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None