

(51) International Patent Classification:
C08L 33/06 (2006.01)(21) International Application Number:
PCT/US2012/051968(22) International Filing Date:
23 August 2012 (23.08.2012)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
61/527,703 26 August 2011 (26.08.2011) US
13/592,393 23 August 2012 (23.08.2012) US(71) Applicant (for all designated States except US): **ARROW-
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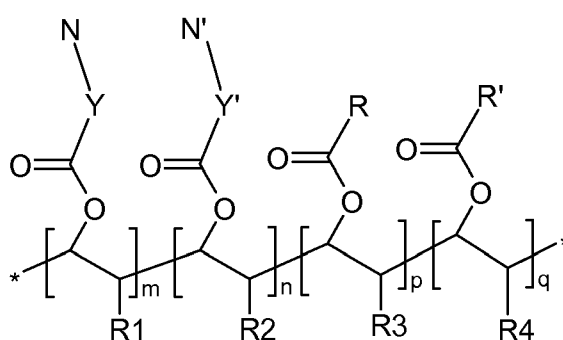
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ence Drive, Suite C, Madison, WI 53711 (US).(81) Designated States (unless otherwise indicated, for every
kind of national protection available): AE, AG, AL, AM,
AO, AT, AU, AZ, BA, BB, BG, BH, BN, BR, BW, BY,
BZ, CA, CH, CL, CN, CO, CR, CU, CZ, DE, DK, DM,
DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT,
HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP,
KR, KZ, LA, LC, LK, LR, LS, LT, LU, LY, MA, MD,
ME, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI,
NO, NZ, OM, PE, PG, PH, PL, PT, QA, RO, RS, RU, RW,
SC, SD, SE, SG, SK, SL, SM, ST, SV, SY, TH, TJ, TM,
TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM,
ZW.(84) Designated States (unless otherwise indicated, for every
kind of regional protection available): ARIPO (BW, GH,
GM, KE, LR, LS, MW, MZ, NA, RW, SD, SL, SZ, TZ,
UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, RU, TJ,
TM), European (AL, AT, BE, BG, CH, CY, CZ, DE, DK,
EE, ES, FI, FR, GB, GR, HR, HU, IE, IS, IT, LT, LU, LV,
MC, MK, MT, NL, NO, PL, PT, RO, RS, SE, SI, SK, SM,
TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW,
ML, MR, NE, SN, TD, TG).

Published:

- with international search report (Art. 21(3))
- with sequence listing part of description (Rule 5.2(a))

(54) Title: POLY(VINYL ESTER) POLYMERS FOR IN VIVO NUCLEIC ACID DELIVERY

FIG. 1



amphipathic poly(vinyl ester) random copolymer

(57) Abstract: The present invention is directed membrane active poly(vinyl ester) polymers and compositions for targeted delivery of RNA interference (RNAi) polynucleotides to cells in vivo. RNAi polynucleotides are conjugated to the poly(vinyl ester) polymers and the polymers are reversibly modified to enable in vivo targeted delivery. Membrane activity of the poly(vinyl ester) provides for movement of the RNAi polynucleotides from outside the cell to inside the cell. Reversible modification provides physiological re-sponsiveness.