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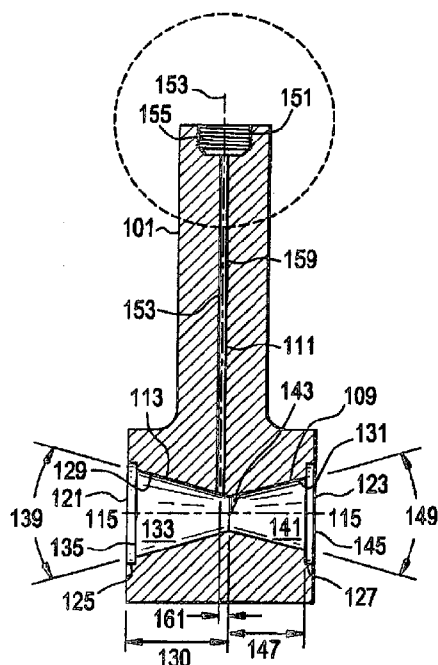
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 61/150,172 5 February 2009 (05.02.2009) US</p> <p>(71) Applicant (<i>for all designated States except US</i>): DOW GLOBAL TECHNOLOGIES LLC. [US/US]; 2040 Dow Center, Midland, MI 48674 (US).</p> <p>(72) Inventors; and</p> <p>(75) Inventors/Applicants (<i>for US only</i>): BERBEE, Otto [NL/NL]; Carmelweg 17, 4561XE Hulst (NL). KEAT-</p> | <p>ING, John [US/US]; 14603 Riverforest, Houston, TX 77079 (US). HOMMERSOM, Gerrit [US/NL]; Stationsstraat 21, 4571LA Axel (NL). MORSE, Larry [CA/US]; 3406 S Ripples Ct, Missouri City, TX 77459 (US). ZSCHOCH, Werner [DE/DE]; Schellsitz 55, 06618 Naumburg (DE).</p> <p>(74) Agent: KRUPP, Stephen; 2030 Dow Center, Midland, MI 48674 (US).</p> <p>(81) Designated States (<i>unless otherwise indicated, for every kind of national protection available</i>): AE, AG, AL, AM, AO, AT, AU, AZ, BA, BB, BG, BH, 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, RO, RS, RU, 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.</p> |
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- (54) Title:** LOW DENSITY POLYETHYLENE (LDPE) TUBULAR REACTOR FOR PEROXIDE INITIATOR INJECTION

FIG. 1C



(57) Abstract: An initiator injection nozzle for mixing an initiator with a process fluid, comprising: a body comprising an inlet port to receive the process fluid, an outlet port, and an injector inlet to receive initiator; a process fluid flow passage through which the process fluid traverses between the inlet port and outlet port along a central process flow axis, further comprising a constricting portion, a throat, and an expanding portion in that order,- an initiator fluid flow passage through which the initiator traverses between the injector inlet and injector outlet along an injector central vertical axis, where the initiator fluid flow passage intersects the process fluid flow passage in the constricting portion; a stylus at least partially containing the initiator fluid flow passage and further comprising a shaped injector tip forming the injector outlet of the initiator fluid flow passage; where the injector outlet is located in the constricting portion of the process fluid flow passage and upstream of the throat by a horizontal offset as determined along the central process flow axis; and where the injector outlet is located off the central process flow axis by a vertical offset as determined along the injector central vertical axis



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