

1) Family number: 48533090 (US2012222869A)

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Title: WIRELINE CABLE FOR USE WITH DOWNHOLE TRACTOR ASSEMBLIES

Abstract: A wireline cable includes an electrically conductive cable core for transmitting electrical power, an inner armor layer disposed around the cable core, and an outer armor layer, wherein a torque on the cable is balanced by providing the outer armor layer with a predetermined amount of coverage less than an entire circumference of the inner armor layer, or by providing the outer armor layer and the inner armor layer with a substantially zero lay angle.

Classifications:

International (IPC 8-9): D07B1/14 E21B19/00 E21B19/22 E21B23/00

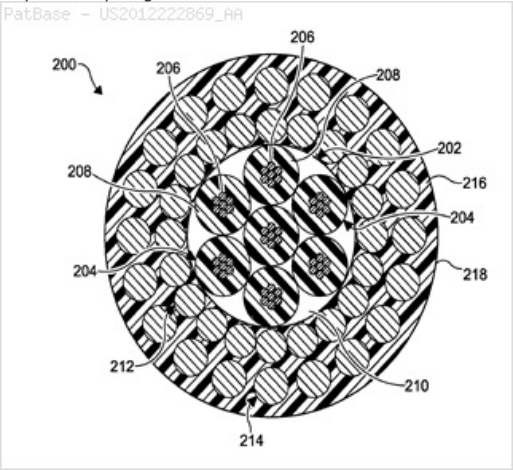
E21B23/14 (Advanced/Invention);

H01B7/04 (Advanced/Non-invention)

CPC: E21B23/14 D07B1/147 H01B7/046

European: E21B23/14 T01B7/04E

US: 166/380 166/385



Family:

Publication number	Publication date	Application number	Application date
AU2010298356 AA	20110331	AU20100298356	20100922
AU2010298356 BB	20151217	AU20100298356	20100922
CA2774775 AA	20110331	CA20102774775	20100922
EP2480750 A2	20120801	EP20100819372	20100922
MX2012003397 A1	20120410	MX20120003397	20100922
MX336510 B	20160122	MX20120003397	20100922
US2012222869 AA	20120906	US20100497142	20100922
US2015233200 AA	20150820	US20150705094	20150506
US2017268304 AA	20170921	US20170617270	20170608
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US10240416 BB	20190326	US20170617270	20170608
WO11037974 A2	20110331	WO2010US49783	20100922
WO11037974 A3	20110707	WO2010US49783	20100922

Priority:

US20090277219P 20090922 US20100497142 20100922 WO2010US49783 20100922
US20120497142 20120509 US20150705094 20150506 US20170617270 20170608

Probable Assignee: SCHLUMBERGER TECHNOLOGY CORP

Assignee(s): (std): SCHLUMBERGER CA LTD ; SCHLUMBERGER HOLDINGS ; VARKEY JOSEPH ; SCHLUMBERGER SERVICES PETROL ; SCHLUMBERGER TECHNOLOGY BV ; SCHLUMBERGER TECHNOLOGY CORP ; PRAD RES AND DEV LTD

Assignee(s): PRAD RESEARCH AND DEVELOPMENT LIMITED ; PRAD RESEARCH AND DEVELOPMENT LTD ; SCHLUMBERGER CANADA LTD ; SCHLUMBERGER HOLDINGS LTD ; SCHLUMBERGER CANADA LIMITED ; SCHLUMBERGER HOLDINGS LIMITED ; SERVICES PETROLIERS SCHLUMBERGER ; SCHLUMBERGER TECHNOLOGY B V

Inventor(s): (std): VARKEY JOSEPH

Inventor(s): JOSEPH VARKEY

Agent(s): GRIFFITH HACK; SMART AND BIGGAR; FORD MICHAEL FREDERICK; TREVOR; TREVOR G; PAPE EILEEN; FONSECA DARLA P ET AL

Designated states: AE AG AL AM AO AT AU AZ BA BB BE BF BG BH BJ BR BW BY BZ CA CF CG CH CI CL CM CN CO CR CU CZ DE DK DM DO DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GT GW HN HR HU ID IE IL IN IS IT JP KE KG KM KN KP KR KZ LA LC LI LK LR LS LT LU LV MA MC MD ME MG MK ML MN MR MT MW MX MY MZ NA NE NG NI NL NO NZ OM PE PG PH PL PT RO RS RU SC SD SE SG SI SK SL SM SN ST SV SY SZ TD TG TH TJ TM TN TR TT TZ UA UG US UZ VC VN ZA ZM ZW

Title: ENHANCED ELECTRICAL CABLES

Abstract: Wellbore electrical cables according to the invention include at least one insulated conductor, at least one layer of armor wires surrounding the insulated conductor, and a polymeric material disposed in the interstitial spaces formed between armor wires and interstitial spaces formed between the armor wire layer and insulated conductor which may further include wear resistance particles or even short fibers, and the polymeric material may further form a polymeric jacket around an outer, layer of armor wires. The insulated conductor is formed from a plurality of metallic conductors encased in an insulated jacket. The invention also discloses a method of preparing a cable by extruding first layer of polymeric material upon at least one insulated conductor; serving a first layer of armor wires upon the polymeric material; softening the polymeric material to partially embed armor wires; extruding a second layer of polymeric material over the armor wires; serving a second layer outer armor wires thereupon; softening the polymeric material to partially embed the second armor wire layer; and optionally extruding a third layer of polymeric material over the outer armor wires embedded in the second layer of polymeric material. Further disclosed are methods of using the cables of the invention in seismic and wellbore operations, including logging operations.

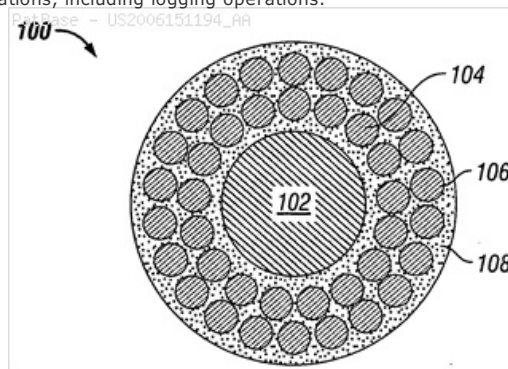
Classifications:

International (IPC 8-9): B02C19/06 B65B1/20 B65B3/22 D07B1/14 E21B17/00 E21B17/20 E21B19/00 E21B19/08 E21B19/22 E21B23/00 E21B23/14 E21B43/00 E21B43/16 E21B43/25 E21B43/26 E21B43/267 E21B47/00 E21B47/12 F16L11/00 H01B11/00 H01B13/14 H01B7/00 H01B7/04 H01B7/14 H01B7/17 H01B7/18 H01B7/285 H02G1/10 H02G15/013 H02G15/08 H02G3/04 (Advanced/Invention); E21B23/00 E21B47/12 (Advanced/Non-invention); B02C19/06 B65B1/00 B65B3/00 E21B19/00 E21B43/16 E21B43/25 E21B47/00 H01B7/00 H01B7/04 H01B7/17 H01B7/18 (Core/Invention); E21B47/12 (Core/Non-invention)

International (IPC 1-7): E21B23/14 E21B47/12 F16L11/00 H01B7/04
CPC: E21B47/12 E21B17/028 E21B17/00 E21B2023/008 H01B7/1895 H01B13/141 B65B37/00 E21B47/00 E21B47/0001 E21B43/26 E21B17/2006 D07B1/147 E21B17/206 H01B7/046 H02G1/10 E21B47/121 E21B19/22

European: B65B37/00 E21B17/00 E21B17/02E E21B17/20D E21B47/12 H01B13/14B H01B7/04E H01B7/18U H02G1/10 P21B23/00T

US: 1/1 141/11 141/67 141/69 141/70 166/250.01 166/278 166/280.2 166/305.1 166/308.1 166/308.100S 166/335 166/336 166/339 166/352 166/385 166/385S 166/66 166/66S 166/67 166/67S 166/77.1 174/102.00R 174/102R 174/106.00R 174/106.00RP 174/106R 174/107 174/113R 174/68.1 174/74R 174/75R 174/79 174/84R 241/39 241/5 340/853.1 340/853.100S

**Family:**

Publication number	Publication date	Application number	Application date
AT534127 E	20111215	AT20060701794T	20060112
AU2006205539 AA	20060720	AU20060205539	20060112
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EA200701493 A1	20071228	EA20070001493	20060112
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GB2456908 A1	20090805	GB20090001273	20090127
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Priority:

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Probable Assignee: SCHLUMBERGER TECHNOLOGY CORP

Assignee(s): (std): ARDIC HIFZI ; BILLINGHAM MATTHEW ; EL KHOLY ISMAIL ; FULIN WAYNE ; GILLAN PETER ; KIM BYONG ; KIM BYONG JUN ; KIM BYONG JUN ; SAIT NOOR F ; HERNANDEZ SOLIS VLADIMIR ; LOZANO GENDREAU JOSE RAMON ; VARKEY JOSEPH ; SRIDHAR GARUD ; SCHLUMBERGER CA LTD ; SCHLUMBERGER SERVICES PETROL ; SCHLUMBERGER HOLDINGS ; SCHLUMBERGER TECHNOLOGY BV ; SCHLUMBERGER TECHNOLOGY CORP ; PRAD RES AND DEV LTD ; JACOB GREGOIRE ; PESSIN JEAN LOUIS ; SCHLUMBERGER TECHNOLOGY CORP ; SBORDONE ANDREA ; SMITS JAN W

Assignee(s): SHLJUMBERGER TEKNOLODZHI BV ; SCHLUMBERGER CANADA LTD ; SERVICES PETROLIERS SCHLUMBERGER ; SCHLUMBERGER HOLDINGS LTD ; SERVICES PETROLIERS SCHLUMBERGER SOC ANONYME ; PRAD RESEARCH AND DEVELOPMENT LTD

Inventor(s): (std): GARUD SKRIDHAR ; GARUD SRIDHAR ; JACOB GREGOIRE ; JOSEPH VARKEY ; KIM BYONG ; KIM BYONG J ; KIM BYONG JUN ; BYONG KIM JUN ; EL KHOLY ISMAIL ; FULIN WAYNE ; NOOR SAIT ; PESSIN JEAN LOUIS ; SAIT NOOR ; SRIDHAR GARUD ; VARKEY JOSEPH ; VARKEY JOSEPH P ; WAYNE FULIN ; LOZANO GENDREAU JOSE RAMON ; HERNANDEZ SOLIS VLADIMIR ; GILLAN PETER ; ARDIC HIFZI ; VARKI DZHOZEF ; VARKEY JOSPEH ; SMITS JAN V ; SBORDONE ANDREA ; SAIT NOOR F ; LOZANO ZHENDRO KHOSE RAMON ; GILLAN PITER ; EHRNANDES SOLIS VLADIMIR ; BILLINGHAM MATTHEW ; ARDIK KHIFZI ; SMITS JAN W

Inventor(s): PETER GILLAN ; BYONG JUN KIM ; JOSPEH VARKEY ; JOSE RAMON LOZANO GENDREAU ; JAN W SMITS ; HIFZI ARDIC ; VLADIMIR HERNANDEZ SOLIS ; VARKEY JOSEPH MISSOURI CITY ; SRIDHAR GARUD STAFFORD ; FULIN WAYNE SUGAR LAND ; KIM BYONG JUN SUGAR LAND

Agent(s): GRIFFITH HACK ; SMART AND BIGGAR ; HASELTINE LAKE LLP ; BREVALEX ; SCHLUMBERGER CONVEYANCE AND DELIVERY, ATTN: ROBIN NAVA ; SCHLUMBERGER CONVEYANCE AND DELIVERY ATTN ROBIN NAVA ; SCHLUMBERGER TECHNOLOGY CORP ; SCHLUMBERGER IPC, ATTN: TIM CURINGTON ; SCHLUMBERGER IPC ATTN TIM CURINGTON ; SCHLUMBERGER IPC, ATTN: DAVID CATE ; SCHLUMBERGER IPC ATTN DAVID CATE ; SCHLUMBERGER IPC, ATTN: DAVID CATE ; SCHLUMBERGER TECHNOLOGY DAVID CATE CORP ; BILL ; TIM ; DAVID ; CATE DAVID ; FLYNN MICHAEL ; CASTANO JAIME ; JAIME ; MICHAEL ; NAVA ROBIN ; ROBIN ; JODY LYNN ; MICHAEL L ; JODY ; CHARLOTTE ; JOHN ; TREVOR ; CATHY

Designated states: AE AG AL AM AT AU AZ BA BB BE BF BG BJ BR BV BY BZ CA CG CH CI CM CN CO CR CU CY CZ DE DK DM DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GW HR HU ID IE IL IN IS IT JP KE KG KM KN KP KR KZ LC LI LK LR LS LT LU LV LY MA MC MD MG MK ML MN MR MW MX MZ NA NE NG NI NL NO NZ OM PG PH PL PT RO RU SC SD SE SG SI SK SL SM SN SY SZ TD TG TJ TM TN TR TT TZ UA UG US UZ VC VN YU ZA ZM ZW

3) Family number: 48165167 (US2012163758A)

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Title: INSULATED COMPOSITE POWER CABLE AND METHOD OF MAKING AND USING SAME

Abstract: An insulated composite power cable having a wire core defining a common longitudinal axis, a multiplicity of composite wires around the wire core, and an insulative sheath surrounding the composite wires. In some embodiments, a first multiplicity of composite wires is helically stranded around the wire core in a first lay direction at a first lay angle defined relative to a center longitudinal axis over a first lay length, and a second multiplicity of composite wires is helically stranded around the first multiplicity of composite wires in the first lay direction at a second lay angle over a second lay length, the relative difference between the first lay angle and the second lay angle being no greater than about 4 degrees. The insulated composite cables may be used for underground or underwater electrical power transmission. Methods of making and using the insulated composite cables are also described.

Classifications:

International (IPC 8-9): D07B1/02 D07B1/06 D07B1/16 G02B6/44
H01B1/02 H01B11/20 H01B11/22 H01B13/00 H01B13/02 H01B13/22
H01B3/42 H01B3/48 H01B7/00 H01B7/04 H01B7/12 H01B7/14 H01B7/17
H01B7/18 H01B9/00 H01B9/02 H01R43/00 (Advanced/Invention);
B82Y30/00 B82Y99/00 H01B7/18 (Advanced/Non-invention)

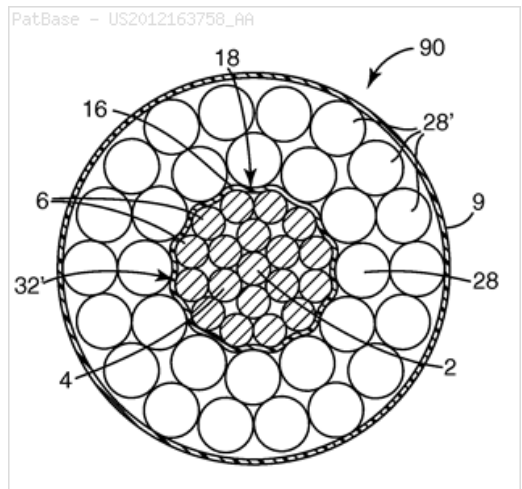
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H01B9/006 H01B7/14 H01B3/48 H01B9/02 H01B7/0009 H01B7/048
H01B11/20 H01B13/02

European: H01B5/10G H01B7/14

US: 1/1 174/113.00RP 174/113.00RS 174/113R 174/115 174/126.2
174/126.4 174/47 29/825 29/825S 29/868 29/872 29/872S 385/101
385/101P 385/15 977/742 977/742S 977/932 977/932S

JP F-Term: 5G309 5G309/KA02 5G309/KA04 5G309/KA05 5G311
5G311/EA04 5G311/FA01 5G311/FA02 5G311/FA03 5G311/FB01

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JP F-Index: H01B11/22 H01B13/00/527 H01B7/00/310 H01B7/12 H01B7/14 H01B7/18/F H01B7/18/G D07B1/02 D07B1/06/Z D07B1/16 H01B7/18/A H01B7/18/H H01B9/00/Z



Family:

Publication number	Publication date	Application number	Application date
BR112012000996 A2	20160315	BR20121100996	20100708
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US2012168199 AA	20120705	US20100382591	20100630
US2014345906 AA	20141127	US20140454050	20140807
US2015325337 AA	20151112	US20150795939	20150710
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WO11008568 A2	20110120	WO2010US40517	20100630
WO11008568 A3	20110310	WO2010US40517	20100630
WO11008620 A2	20110120	WO2010US41315	20100708
WO11008620 A3	20110331	WO2010US41315	20100708

Priority:

US20090226056P 20090716	US20090226151P 20090716	US20100382591 20100630
WO2010US40517 20100630	US20100382597 20100708	WO2010US41315 20100708
US20120382597 20120316	US20140454050 20140807	US20150795939 20150710

Probable Assignee: 3M CO

Assignee(s): (std): 3M CO ; 3M INNOVATIVE PROPERTIES CO ; MCCULLOUGH COLIN ; GREYER MICHAEL F ; DEVE HERVE E ; JOHNSON DOUGLAS E ; JOHNSON DOUGLAS E ; 3M INNOVATIVE PROPERTIES CO

Assignee(s): 3M INNOVATIVE PROPERTIES COMPANY ; 3M INNOVATIVE PROPERTIES COMPANY

Inventor(s): (std): MCCULLOUGH COLIN ; GREYER MICHAEL F ; DEVE HERVE E ; JOHNSON DOUGLAS E ; COLIN MCCULLOUGH ; JOHNSON DOUGLAS ; JOHNSON DOUGLAS E ; MCCULLOUGH COLLIN

Inventor(s): DOUGLAS JOHNSON ; HERVE E DEVE ; MICHAEL F GREYER ; DEVE HERVE ; GREYER MICHAEL

Agent(s): SMART AND BIGGAR; ISARPATENT; ADAM; JAMES A; BAKER JAMES A ET AL

Designated states: AE AG AL AM AO AT AU AZ BA BB BE BF BG BH BJ BR BW BY BZ CA CF CG CH CI CL CM CN CO CR CU CY CZ DE DK DM DO DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GT GW HN HR HU ID IE IL IN IS IT JP KE KG KM KN KP KR KZ LA LC LI LK LR LS LT LU LV LY MA MC MD ME MG MK ML MN MR MT MW MX MY MZ NA NE NG NI NL NO NZ OM PE PG PH PL PT RO RS RU SC SD SE SG SI SK SL SM SN ST SV SY SZ TD TG TH TJ TM TN TR TT TZ UA UG US UZ VC VN ZA ZM ZW

Title: ELECTRICAL CABLES

Abstract: An electrical cable is provided which includes a coated electrical conductor, a polymeric protective layer which traps any coating flakes, a first insulating jacket disposed adjacent to the electrical conductor and having a first relative permittivity. A second insulating jacket disposed adjacent to the first insulating jacket and having a second relative permittivity that is less than the first relative permittivity. In another aspect of the present invention, a method is provided for manufacturing a cable that includes providing a coated electrical conductor, extruding a polymeric protective layer over the coated electrical conductor, extruding a first insulating jacket over the protective polymeric layer, and extruding a second insulating jacket thereon. Cables of the invention may further include armor wire layers or even current return conductors.

Classifications:

International (IPC 8-9): H01B11/02 H01B7/04

H01B7/18 (Advanced/Invention);

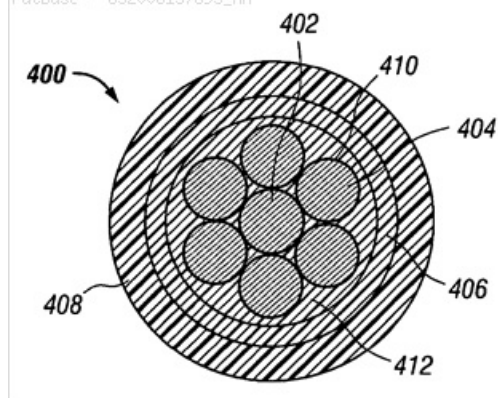
H01B11/02 H01B7/00 H01B7/04 H01B7/18 (Core/Invention)

CPC: H01B7/0291 H01B7/046 H01B7/2806

European: H01B7/02R H01B7/04E H01B7/28C

US: 174/102R 174/107 174/108 174/113R

PatBase - US2006137895_AA



Family:

Publication number	Publication date	Application number	Application date
CA2591899 AA	20070626	CA20052591899	20051220
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US2006137895 AA	20060629	US20040024305	20041228
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Priority:

US20040024305 20041228

WO20051B54345 20051220

Probable Assignee: SCHLUMBERGER CONVEYANCE AND DELIVERY

Assignee(s): (std): ARIF FAISAL ; ARNAUD JEFFERY ; ARNAUD JEFFREY ; KIM BYONG J ; KIM BYONG JUN ; NGUYEN JOHN C ; NGUYEN JOHN CUONG ; VARKEY JOSEPH P ; WIJNBERG WILLEM A ; SINGH ANIL ; SCHLUMBERGER CA LTD ; SCHLUMBERGER SERVICES PETROL ; SCHLUMBERGER HOLDINGS ; SCHLUMBERGER TECHNOLOGY BV ; SCHLUMBERGER TECHNOLOGY CORP

Assignee(s): SCHLUMBERGER CONVEYANCE AND DELIVERY ; SCHLUMBERGER CANADA LTD ; SERVICES PETROLIERS SCHLUMBERGER ; SCHLUMBERGER HOLDINGS LTD

Inventor(s): (std): CUONG JOHN ; KIM BYONG JUN ; NGUYEN JOHN CUONG ; ARNAUD JEFFERY ; NGUYEN JOHN C ; ARNAUD JEFFREY ; SINGH ANIL ; ARIF FAISAL ; WIJNBERG WILLEM A ; KIM BYONG J ; VARKEY JOSEPH P

Inventor(s): WIJNBERG WILLEM ; VARKEY JOSEPH ; NGUYEN JOHN ; KIM BYONG ; JOHN CUONG ; ANIL SINGH ; WILLEM A WIJNBERG ; BYONG JUN KIM ; JOSEPH P VARKEY ; FAISAL ARIF ; JEFFERY ARNAUD

Agent(s): SMART AND BIGGAR; SCHLUMBERGER CONVEYANCE AND DELIVERY, ATTN: ROBIN NAVA; SCHLUMBERGER CONVEYANCE AND DELIVERY ATTN ROBIN NAVA; JAIME; DALE; DAVID

Designated states: AE AG AL AM AT AU AZ BA BB BE BF BG BJ BR BW BY BZ CA CF CG CH CI CM CN CO CR CU CY CZ DE DK DM DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GW HR HU ID IE IL IN IS IT JP KE KG KM KN KP KR KZ LC LK LR LS LT LU LV LY MA MC MD MG MK ML MN MR MW MX MZ NA NE NG NI NL NO NZ OM PG PH PL PT RO RU SC SD SE SG SI SK SL SM SN SY SZ TD TG TJ TM TN TR TT TZ UA UG US UZ VC VN YU ZA ZM ZW

Title: OPTICAL FIBER CABLES FOR WELLBORE APPLICATIONS

Abstract: A cable which includes conductor bundles prepared from at least one optical fiber positioned either centrally or helically about the center axis of the bundle, metallic conductors helically positioned around the bundles center axis, and a polymeric insulation material. A method of making a cable including forming a conductor bundle by placing helically positioned conductors and optical fibers about the periphery of a central optical fiber or metallic conductor, encasing the conductors, optical fibers, in a polymeric insulation material, and grouping the conductor bundles together.

Classifications:

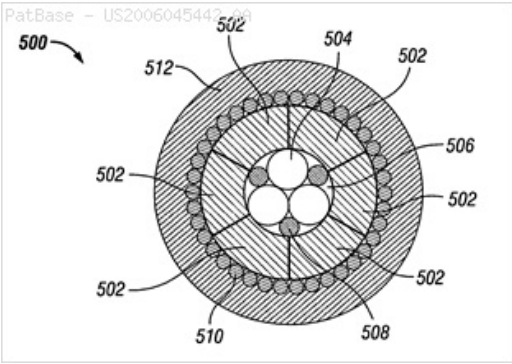
International (IPC 8-9): G02B6/44 (Advanced/Invention);

G02B6/00 G02B6/44 (Core/Invention)

International (IPC 1-7): G02B6/44

CPC: G02B6/4413 G02B6/4416

European: G02B6/44C5B G02B6/44C6A



Family:

Publication number	Publication date	Application number	Application date
MXPA06013225 A1	20070228	MX2006PA13225	20050517
RU2006145026 A	20080627	RU20060145026	20050517
RU2411554 C2	20110210	RU20060145026	20050517
US2006045442 AA	20060302	US20040931736	20040901
US7324730 BB	20080129	US20040931736	20040901
WO05114285 A1	20051201	WO2005IB51607	20050517

Priority:

US20040572396P 20040519 US20040931736 20040901 WO2005IB51607 20050517

Probable Assignee: SCHLUMBERGER TECHNOLOGY CORP

Assignee(s): (std): DARPI MONICA ; KUNATHIKOM SUMITRA ; MYDUR RAVICHARAN ; PRAD RES AND DEV NV ; SAIT NOOR ; SCHLUMBERGER CA LTD ; SCHLUMBERGER SURENCO SA ; SCHLUMBERGER SERVICES PETROL ; SCHLUMBERGER OVERSEAS ; SCHLUMBERGER SERVICES LTD ; SCHLUMBERGER HOLDINGS ; SCHLUMBERGER SEACO INC ; SCHLUMBERGER OILFIELD ASSIST ; SCHLUMBERGER TECHNOLOGY BV ; VARKEY JOSEPH ; WIJNBERG WILLEM ; SCHLUMBERGER TECHNOLOGY CORP

Assignee(s): SHLUMBERGER TEKNOLODZHI BV ; SCHLUMBERGER OVERSEAS S A ; SCHLUMBERGER SURENCO S A ; SERVICES PETROLIERS SCHLUMBERGER ; SCHLUMBERGER CANADA LTD ; SCHLUMBERGER OVERSEAS SA ; SCHLUMBERGER HOLDINGS LTD ; SCHLUMBERGER OILFIELD ASSISTANCE LTD ; PRAD RESEARCH AND DEVELOPMENT N V ; PRAD RESEARCH AND DEVELOPMENT NV

Inventor(s): (std): VARKEY JOSEPH ; MYDUR RAVICHARAN ; SAIT NOOR ; WIJNBERG WILLEM ; KUNATHIKOM SUMITRA ; DARPI MONICA ; VARKI DZHOZE ; SAJT NOOR ; KUNATKHOM SUMITRA ; VIJNBERG VILLEM ; DARPI MONIKA ; MIDUR RAVICHARAN

Inventor(s): WILLEM WIJNBERG ; JOSEPH VARKEY ; SUMITRA KUNATHIKOM ; MONICA DARPI ; NOOR SAIT ; RAVICHARAN MYDUR

Agent(s): SCHLUMBERGER CONVEYANCE AND DELIVERY, ATTN: ROBIN NAVA; SCHLUMBERGER CONVEYANCE AND DELIVERY ATTN ROBIN NAVA; CATE DAVID; FLYNN MICHAEL; CASTANO JAIME; JAIME; MICHAEL; DAVID

Designated states: AE AG AL AM AT AU AZ BA BB BE BF BG BJ BR BW BY BZ CA CF CG CH CI CM CN CO CR CU CY CZ DE DK DM DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GW HR HU ID IE IL IN IS IT JP KE KG KM KP KR KZ LC LK LR LS LT LU LV MA MC MD MG MK ML MN MR MW MX MZ NA NE NG NI NL NO NZ OM PG PH PL PT RO RU SC SD SE SG SI SK SL SM SN SY SZ TD TG TJ TM TN TR TT TZ UA UG US UZ VC VN YU ZA ZM ZW

6) Family number: 69992248 (US2018156848A)

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Title: ANTI-POWER THEFT CABLES AND METHODS

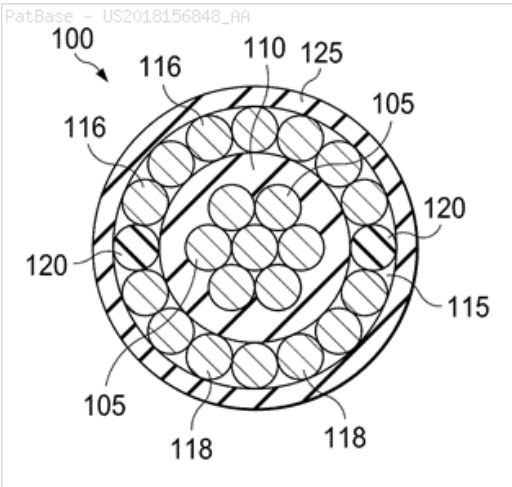
Abstract: A cable includes a core and a plurality of layers surrounding the core. In one embodiment, at least one of the layers surrounding the core includes multiple sets of phase conductors. The respective sets of phase conductors are electrically isolated from one another. Other cables are also provided.

Classifications:

International (IPC 8-9): G01R22/06 G02B6/42 H01B7/02 H01B7/38 H01B9/00 H01B9/04 (Advanced/Invention)

CPC: G01R22/066 H01B7/38 H01B7/0225 G02B6/421 H01B9/006 H01B9/04

US: 174/113C



Family:

Publication number	Publication date	Application number	Application date
AU2017368171 AA	20180607	AU20170368171	20171130
AU2017368171 AA	20190613	AU20170368171	20171130
CO20180006944 A2	20180719	CO20180006944	20180716
US2018156848 AA	20180607	US20170827692	20171130
US10288652 BB	20190514	US20170827692	20171130
WO18102551 A2	20180607	WO2017US63958	20171130

Priority:

US20160429168P 20161202 US20170525424P 20170627 US20170827692 20171130
WO2017US63958 20171130

Probable Assignee: GENERAL CABLE TECH CORP

Assignee(s): (std): GENERAL CABLE TECH CORP

Assignee(s): GENERAL CABLE TECHNOLOGIES CORP

Inventor(s): (std): OSPINA RAMIREZ CARLOS AUGUSTO ; WEITZEL JARED D ; WEITZEL JARED ; OSPINA RAMIREZ CARLOS ; WEITZEL D JARED

Inventor(s): JARED WEITZEL D ; CARLOS AUGUSTO OSPINA RAMIREZ ; WEITZEL D

Agent(s): PIZZEYS PATENT AND TRADE MARK ATTORNEYS PTY LTD; MARGARITA CASTELLANOS ABONDANO; ULMER AND BERNE LLP; ROBBINS ERIC M ET AL

Designated states: AE AG AL AM AO AT AU AZ BA BB BE BF BG BH BJ BN BR BW BY BZ CA CF CG CH CI CL CM CN CO CR CU CY CZ DE DJ DK DM DO DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GT GW HN HR HU ID IE IL IN IR IS IT JO JP KE KG KH KM KN KP KR KW KZ LA LC LK LR LS LT LU LV LY MA MC MD ME MG MK ML MN MR MT MW MX MY MZ NA NE NG NI NL NO NZ OM PA PE PG PH PL PT QA RO RS RU RW SA SC SD SE SG SI SK SL SM SN ST SV SY SZ TD TG TH TJ TM TN TR TT TZ UA UG US UZ VC VN ZA ZM ZW

7) Family number: 47719269 (US2012082422A)

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Title: ELECTRIC CABLE WITH STRAIN SENSOR AND MONITORING SYSTEM AND METHOD FOR DETECTING STRAIN IN AT LEAST ONE ELECTRIC CABLE

Abstract: An electric cable includes a strain sensor longitudinally extending along the cable and including a strain optical fibre arranged within a bending neutral region surrounding and including a bending neutral longitudinal axis of the electric cable, and at least two longitudinal structural elements, at least one of the at least two longitudinal structural elements being a core including an electrical conductor, wherein the strain sensor is embedded in a strain-transferring filler mechanically coupling at least one of the at least two longitudinal structural elements with the strain sensor. With the disclosed cable construction, the strain experienced by the at least one of the at least two longitudinal structural elements is transferred to the strain sensor at least in a strained condition. In the preferred embodiments, the electric cable is a heavy-duty cable.

Classifications:

International (IPC 8-9): G01K11/32 G01L1/24 G01M11/08 G02B6/44

H01B11/22 H01B7/32 (Advanced/Invention);

H01B7/04 H01B9/00 (Advanced/Non-invention)

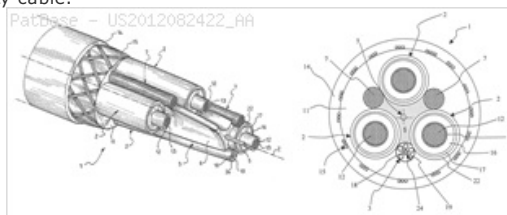
CPC: H01B7/32 G01K11/32 G01K2011/322 G01L1/242 G01M11/086

H01B7/041 H01B9/005 D07B1/145 D07B2301/259

European: G01K11/32 G01L1/24B G01M11/08B4 H01B7/32 S01K11/322

T01B7/04B T01B9/00D

US: 385/101 385/101P 73/800 73/800S



Family:

Publication number	Publication date	Application number	Application date
AU2009346811 AA	20101202	AU20090346811	20090527
AU2009346811 BB	20150910	AU20090346811	20090527
AU2015261731 AA	20151217	AU20150261731	20151130
AU2015261731 BB	20170420	AU20150261731	20151130
BRPI0924731 A2	20160126	BR2009PI24731	20090527
CA2763272 AA	20101202	CA20092763272	20090527
CA2763272 C	20170110	CA20092763272	20090527
CN102460606 A	20120516	CN200980160074	20090527
CN102460606 B	20140416	CN200980160074	20090527
DK2436015 T3	20171106	DK20090779556T	20090527
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EP2436015 B1	20170802	EP20090779556	20090527
EP2555205 A1	20130206	EP20120190576	20090527
RU2011153385 A	20130710	RU20110153385	20090527
RU2510865 C2	20140410	RU20110153385	20090527
US2012082422 AA	20120405	US20090322376	20090527
US8953915 BB	20150210	US20090322376	20090527
WO10136062 A1	20101202	WO2009EP56428	20090527

Priority:

AU20090346811 20090527 WO2009EP56428 20090527 EP20090779556 20090527
AU20150261731 20151130

Probable Assignee: PRYSMIAN SPA

Assignee(s): (std): CARL ARND GUENTHER ; CONSONNI ENRICO ; EWALD REINER ; GASPARI ROBERTO ; PRYSMIAN S P A ; PRYSMIAN SPA ; KITTEL THOMAS ; KEMNITZ CARSTEN ; KNUEPFER BERND ; PRIZMIAN S P A ; SARCHI DAVIDE

Assignee(s): PRIZMIAN SPA

Inventor(s): (std): KITTEL THOMAS ; EWALD REINER ; SARCHI DAVIDE ; KEMNITZ CARSTEN ; CARL ARND GUENTHER ; GASPARI ROBERTO ; KNUEPFER BERND ; CONSONNI ENRICO ; ENRICO CONSONNI ; ROBERTO GASPARI ; ARND GUENTHER CARL ; THOMAS KITTEL ; BERND KNUEPFER ; DAVIDE SARCHI ; CARSTEN KEMNITZ ; REINER EWALD ; EWALD REINER ; KARL ARND GJUNTER ; SARKI DAVIDE ; KEMNITS KARSTEN ; EHVAL D RAJNER ; KNJUPFER BERND ; KITTEL TOMAS ; KONSONNI EHNRIKO ; THOMAS KITTE ; KITTE THOMAS

Inventor(s): REINER EWALD

Agent(s): DAVIES COLLISON CAVE; DAVIES COLLISON CAVE PTY LTD; KIRBY EADES GALE BAKER; BONVICINI DAVIDE; Acco Stefania; FINNEGAN HENDERSON FARABOW GARRETT AND DUNNER LLP; ACCO STEFANIA ET AL

Designated states: AE AG AL AM AO AT AU AZ BA BB BE BF BG BH BJ BR BW BY BZ CA CF CG CH CI CM CN CO CR CU CY CZ DE DK DM DO DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GT GW HN HR HU ID IE IL IN IS IT JP KE KG KM KN KP KR KZ LA LC LI LK LR LS LT LU LV LY MA MC MD ME MG MK ML MN MR MT MW MX MY MZ NA NE NG NI NL NO NZ OM PG PH PL PT RO RS RU SC SD SE SG SI SK SL SM SN ST SV SY SZ TD TG TJ TM TN TR TT TZ UA UG US UZ VC VN ZA ZM ZW

8) Family number: 24048457 (US4359598A)

© PatBase

Title: Overhead electric transmission systems

Abstract: A flexible stranded body, such as an electric conductor of an overhead electric transmission or distribution system, comprises at least one stranded layer of elongate elements of metal or metal alloy, at least one elongate compartment within and extending throughout the length of the stranded body and, loosely housed in the elongate compartment, at least one separate optical fibre and/or at least one optical bundle. Preferably, the elongate compartment extends within a circumferentially rigid central core which is surrounded by the stranded layer or layers but it may be a bore in an elongate element of a stranded layer or an elongate space bounded by two adjacent elongate elements.

Classifications:

International (IPC 8-9): G02B6/44 H01B11/22

H01B5/10 (Advanced/Invention);

G02B6/44 H01B11/00 H01B5/00 (Core/Invention)

International (IPC 1-7): G02B5/14 G02B5/16 G02B5/172 G02B6/44

H01B11/00 H01B11/18 H01B11/22 H01B5/08 H01B5/10 H01B7/04

H01B7/18 H01P3/00 H02G7/00

CPC: G02B6/4403 G02B6/4416 G02B6/4422 H01B5/108 H01B5/10

European: G02B6/44C2 G02B6/44C6A G02B6/44C6A2 H01B5/10

H01B5/10M

US: 174/108 174/40R 174/41 174/70R 350/96.23 385/101 385/104

385/110 385/113 385/114

JP F-Term: 2H001 2H001/AA01 2H001/AA05 2H001/AA11 2H001/AA13

2H001/AA17 2H001/AA19 2H001/BB01 2H001/BB05 2H001/BB14

2H001/BB19 2H001/BB21 2H001/BB25 2H001/CC02 2H001/CC05

2H001/CC12 2H001/CC13 2H001/CC14 2H001/CC15 2H001/DD02

2H001/DD06 2H001/DD22 2H001/DD23 2H001/DD25 2H001/EE01

2H001/FF01 2H001/JJ02 2H001/KK00 2H001/KK16 2H050 2H050/BA05

2H050/BC13 2H050/BC17 2H050/BC18 2H050/BD07 2H150 2H150/AD25

2H150/AD26 2H150/AE11 2H150/AE12 2H150/AH38 2H150/AH44

2H150/BA05 2H150/BB02 2H150/BB26 2H150/BC02 2H150/BC11

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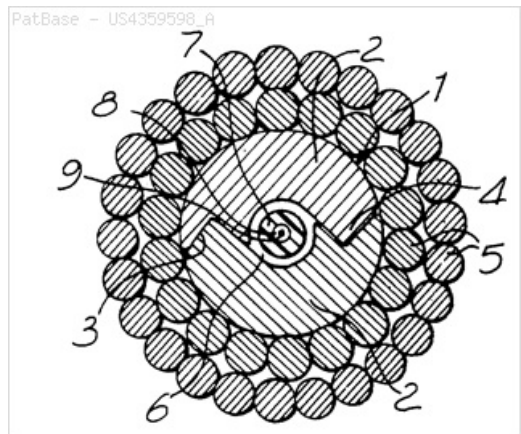
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2H050/BB26/R 2H050/BC00 2H050/BC03 2H050/BC04 2H050/BC11 2H050/BD00 2H050/BD05 2H150/AB03 2H150/AC52

2H150/AD36 2H150/BC03 5G319/HA01 5G319/HD01 5G319/HE10 5G319/HE11 5G319/HE13

JP F-Index: G02B6/44 G02B6/44/351 H01B11/22



Family:

Publication number	Publication date	Application number	Application date
BE894452 Q	19830117	BE19820209061	19820921
CA1112310 A1	19811110	CA19780302814	19780508
DE2820510 A1	19781116	DE19782820510	19780511
DE2820510 C2	19830707	DE19782820510	19780511
FR2390816 A1	19781208	FR19780014310	19780512
FR2390816 B1	19821022	FR19780014310	19780512
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HK21083 A	19830701	HK19830000210	19830623
IT1102646 A	19851007	IT19780049313	19780512
IT7849313 A0	19780512	IT19780049313	19780512
JP1007641 B4	19890209	JP19820141791	19820817
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JP1357049 C3	19870113	JP19780055705	19780512
JP1535202 C3	19891221	JP19820141792	19820817
JP1679298 C3	19920713	JP19820141791	19820817
JP53141641 A2	19781209	JP19780055705	19780512
JP58059507 A2	19830408	JP19820141791	19820817
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JP64007641 B4	19890209	JP19820141791	19820817
JP64007642 B4	19890209	JP19820141792	19820817
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NL7805279 A	19781115	NL19780005279	19780516
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US4491387 A	19850101	US19820411584	19820825
USRE32293 E	19861125	US19840671100	19841113
USRE32374 E	19870317	US19840670801	19841113

Priority:

GB19770020234 19770513 GB19780002861 19780124 CA19780302814 19780508
US19780904557 19780510 US19800220291 19801229

Probable Assignee: BICC PUBLIC CO LTD

Assignee(s): (std): BRITISH INSULATED CALLENDERS ; BRITISH INSULATED CALLENDER S CABLES LTD ; BICC PLC ; BICC LIMITED TE LONDON ; BICC LTD

Assignee(s): BICC LTD LONDON GB ; BICC LIMITED ; BICC PUBLIC CO LTD ; BICC PUBLIC LIMITED COMPANY ; BICC PUBLIC LTD CY ; PICKUP KENNETH H ; GAYLARD BERNARD ; PLESSNER KARL W ; MURPHY ARTHUR B ; FEARNES PETER ; DEY PHILLIP

Inventor(s): (std): P FEARNES ; AASAA BAANAADO MAAFUII ; PIITAA FUAANZU ; BERNARD GAYLARD ; B GAYLARD ; KENNETH HEPWORTH PICKUP ; BAANAADO GEIRAADO ; P DEY ; PHILIP DEY ; A B MURPHY ; K W PLESSNER ; KARL WOLFGANG PLESSNER ; K H PICKUP ; PETER FEARNES ; KENESU HEPUWAASU PIKATSUPU ; KAARU BORUFUGANGU PURESUNAA ; KAARU BORUFUGANKU PURESUNAA ; ARTHUR BERNARD MURPHY ; FUIRITSUPU DEI ; MURPHY A B ; GAYLARD B ; PICKUP K H ; PLESSNER K W ; FEARNES P ; DEY P ; MURPHY ARTHUR BERNARD ; PICKUP KENNETH HEPWORTH ; PLESSNER KARL WOLFGANG ; PLESSNER KARL W ; DEY PHILLIP ; MURPHY ARTHUR B ; GAYLARD BERNARD ; PICKUP KENNETH H ; FEARNES PETER ; DEY PHILIP

Inventor(s): PICKUP KENNETH HEPWORTH UPPERMILL OLDHAM GB ; WOLFGANG PLESSNER KARL ; PLESSNER KARL WOLFGANG KINGS LANGLEY HERTFORDSHIRE ; MURPHY ARTHUR BERNARD RAINFORD ST HELENS GB ; GAYLARD BERNARD HALE ALTRINCHAM CHESHIRE GB ; DEY PHILLIP NEW BARNET HERTFORDSHIRE GB ; HEPWORTH PICKUP KENNETH ; FEARNES PETER HUXTON MERSEYSIDE GB ; BERNARD MURPHY ARTHUR ; PHILLIP DEY PETER FEARNES KARL WOLFGANG PLESSNER KE ; PLESSNER KARL WOLFGANG KINGS LANGLEY... ; PHILLIP DEY PETER FEARNES KARL WOLFGANG...

Agent(s): FETHERSTONHAUGH AND CO

9) Family number: 32761717 (US2006065429A)

PatBase

Title: ELECTRICAL CABLES

Abstract: An electrical cable is provided which includes an electrical conductor, a first insulating jacket disposed adjacent the electrical conductor and having a first relative permittivity, wherein the first insulating jacket is prepared from an admixture of: a polymer selected from the group consisting of polyaryletherether ketone polymer, polyphenylene sulfide polymer, polyether ketone, maleic anhydride modified polymers, Parmax(R) SRP polymers, and any mixtures thereof; and, a fluoropolymer additive. A second insulating jacket disposed adjacent the first insulating jacket and having a second relative permittivity that is less than the first relative permittivity, and wherein the insulating jacket is mechanically bonded to the second insulating jacket. In another aspect of the present invention, a method is provided for manufacturing a cable that includes providing an electrical conductor, extruding a first insulating jacket over the electrical conductor, and extruding a second insulating jacket thereon.

Classifications:

International (IPC 8-9): H01B3/00 H01B3/30 H01B3/36 H01B7/00 H01B7/02 (Advanced/Invention);
H01B3/00 H01B3/30 H01B3/36 H01B7/00 H01B7/02 (Core/Invention)

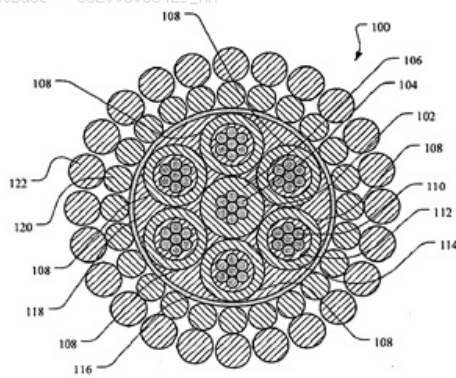
International (IPC 1-7): H01B3/00

CPC: H01B7/046 H01B9/005

European: H01B7/04E T01B9/00D

US: 174/120R

PatBase - US2006065429_A1



Family:

Publication number	Publication date	Application number	Application date
CA2521447 AA	20060328	CA20052521447	20050927
MXPA05010268 A1	20060330	MX2005PA10268	20050926
US2006065429 AA	20060330	US20040952089	20040928
US2006137898 AA	20060629	US20060361572	20060224

Priority:

US20040952089 20040928 CA20052521447 20050927 US20060361572 20060224

Probable Assignee: SCHLUMBERGER TECHNOLOGY CORP

Assignee(s): (std): KIM BYONG J ; SCHLUMBERGER CA LTD ; VARKEY JOSEPH ; SCHLUMBERGER TECHNOLOGY BV

Assignee(s): SCHLUMBERGER TECHNOLOGY CORP ; SCHLUMBERGER CANADA LIMITED ; SCHLUMBERGER TECHNOLOGY B V ; KIM BYONG JUN ; SCHLUMBERGER CANADA LTD

Inventor(s): (std): KIM BYONG JUN ; VARKEY JOSEPH ; KIM BYONG J

Inventor(s): JOSEPH VARKEY ; KIM BYONG

Agent(s):

SMART AND BIGGAR; SCHLUMBERGER CONVEYANCE AND DELIVERY, ATTN: ROBIN NAVA; SCHLUMBERGER
CONVEYANCE AND DELIVERY ATTN ROBIN NAVA