https://helda.helsinki.fi

Kalevala and Finnic Mythology in Italy : Translations, Scholarship and Literature

Piludu, Vesa

Vocifuoriscena
2014

Piludu , V 2014 , Kalevala and Finnic Mythology in Italy : Translations, Scholarship and Literature . in V Piludu & E Frog (eds) , Kalevala: Epica, Magia, Arte e Musica / Epic, Magic, Art and Music . Vocifuoriscena , Viterbo , pp. 507-544 .

http://hdl.handle.net/10138/339755

cc_by_nc_nd
publishedVersion

Downloaded from Helda, University of Helsinki institutional repository.

This is an electronic reprint of the original article.

This reprint may differ from the original in pagination and typographic detail.

Please cite the original version.

>PM4 ?D4 @N + <O@J . DG?P >JI G >JG=JMUJI @?D$MB
#?D@ =T4 @N + <O@J . DG?P D >JG=JMOJI RDC $MB

! JK@MDD< ! JQ@M
%<==D<I J <) PCHJ Ï* ÎP>>@GG ?@G<>M@UDJI @D $JQJBM<AD<?D MQJ 2 PGDH<
1@B<PGDD) PCHJ Ï2 C@ DM? JA! M@GDJI Ð . CJQJBM<KCT =T MQJ 2 PGDH<

! JKTMDBCO Y =T 4J>DAPJMDN>@<

2 M<?PUDJI @DD<GDH< 'G<GDI OM<I N<ODJI 4@N<+ <OO@ . DGP?P
! PM< #?DDDB 4@N<+ <OO@ . DGP?P
>JI G<>JGG=JM<UDJI @?D D >JGG=JM<ODJI RDDC $MJB

'1 ,

$JI O B789EBFG ?@Q@JK@? =T DAMNO. MJE@O

4- ! '$3 - 0'1! #,
> J * D=M@M<" @1<I ODN10*
4D<4@D@JD<%DPGD<
4D@@M<J 42 'G<GD<
RRR QJ>DAPJMDN>@<DO
DDAJ QJ>DAPJMDN>@<DO

) *#4 * 1#30
+ <MDHI F<OP !
&@@NDD FD 1PJHD
F<G@Q<GN@PM<AD
F<G@Q<GN@PM< F<G@Q<GN@PM<AD

11- ! ' 8'- , # Ï1#0%- % %% Ð
. D<UU<$JMJ %DPGDJ ! @N<M@
! DD?<G@?@G$MDPGD 3" 'G<GD<
RRR M@MBJDB<BBD<>JH

'$0 k 12
RRR =DAMJNODD
DDAJ =DAMJNODD

2&#2# 01-$4d', d+k', #, #! +#2&#+-12 # 32'$3*+ '"#, ', 4#, '! #

" # - # ," $', , '! + 72&-*-%7 ', '2 *7
20 , 1* 2'-, 1 1! &-* 01&'. ," *'2#0 230#

4#1 + 22#- .'*3"3
, A<I8EF<GLB9 8?F<A><

2C@GGBI OMI NBOJMUA" 4?8I 4?4 <I ? OC@N>CJGMU@OOPNBNOD<=JPO
OC@@KD>@MBID G>JHKMDN@<NDBPGMBMJPK @SKGMON?DKGH<ON
B@JBMKC@MNKODGGBDONKMJA@NJMUA1<I NFMD<I ? I>D@O%M@F
AJGGMDONI ? @OCI JGBDON OC@AHJPNRMDO@M IOJID $JB<UUM
<I ?<GJ OC@MKP=GD<I <I ? A@@MGDOKODGNJKC@MI ? G@?@MJAOC@
Í$DQ@' <TNJA+ DGI Î ! <MG! <OGI @J #<>CJI @JAOC@N@D ?DQ?P<GN
KMJKJN@<?DAA@M@ODOD @NKM@<ODI JAOC@M@G@QI >@JA* • I I MJÔN@KD>
JMJAOC@JNMBD<GPI JNJI BND @NKTN<MDG@NI ?DOM?P>ODI NOJOC@
" 4?8I 4?4 <I ? >@MBID JAOC@N@D ?DQ?P<GNK<MDPGMGNOD @<HJI B
OC@HPGDP?@'I OODNKMDG@' JA@M<NTI OC@OD>JQ@MDQR JAOC@ODN
OJMTJA' GGBI OMI NBOJMUA" 4?8I 4?4 JAK<MDGI ? >JHKG@@OMI N
GODI NJAOC@@KD> <I ? JAOC@N>CJGMODKJI OC@" 4?8I 4?4 <I ? OC@
MPI JNJI BN- I OODN=<NDN' >JI ND?@MOC@DHK<>OJA" 4?8I 4?4ÎNKP=GD
><ODI JI 'GGBI <I ? #PMJK@I >PGPM@2C@NPMQ@T=@BDNAMJH OC@
@?JAOC@ OC >@OPMT<I ? @S@?NOJOC@KMQN@O?<T<I ?RDGKMJQD?@
OC@M@?@MRDOC <=@@O@MPI ?@MGI ?DB JAOC@=<>FBMJPI ? JAOC@
GI B GNOD B DAOP<ODI OC<O' GGBI NC<Q@C<? AJMOC@>JGPMPG
GI BP<B@JAF<G@Q<GD>MPI JNJI BN

2C@$DQ@' <TNJA+ DGI R@M@<H<EJM@Q@OD OC@0 @QJGPODI <MTT@MJA
<I ? OC@=@BDI D B JAOC@$DMO' GGBI 5 <MJA'I ?DK@?@>@-I + <MC
<M@@GJI <MN@D + DGI <OOC@ODH@K<MOJA PNODB & PI B<MT <I ? <A@M
éQ@?<TNJANOM@@éBCOD B OC@ PNODBI NJG?D@MUA+ <MC<G0 <?@OJFTê@?AMJH
OC@>DOT 2C@ PNODBI NM@JI LP@M@ + DGI JI PBPNO

;4@58E$ HF65L <HF8CC8 68E5<

2C@MDM@@>@CJ MPI JNJI BND GB@M@PM@RMD@@=T'G<GBI NDNJ =@API ?D +E4I 8?FG;EBH;*J878A <A?4A7 4A7#4C?4A7 GBG;8%BEG; 4C8 >@M4D 2CDNR<N<NP>>@NMPGDM@Q@GBP@D #I BGBDC=T %DPN@K@ >@M4D Ë 2C@JJFC<N<GJ=@@KP=GBDC@?ËD LPD@@?A@@@Q@@MDI NËD $M@>C<I ?'G<GBI 2C<I FNJ OC@KM4D@ M@N@MCJA*PDBD"@ I I<<I ?*<PMD*D ?BM@JAOC@8 I D@@MDOTJA 2PMP ODDNMM@?<I ?TJA<OM@Q@@MDLPD@@R@GH JRI D $DG<I ? T>JI OM4ND >@M4DR<NI @Q@M>JH KG@@@T<>>@KO@=TOC@>POGPM<G @NG=GBDCH@OD 'G<GAJMKJGBDD<GM@NJI NC@RJMF@<N<I PNDDBI ! JI NPGD #BTKC<I ?C@R<N>JI ND@M@<OMDDJMÍNJG?OJ PNDDBÎ OC@ Í<M4C @@HTÎ JAOC@G<GBI NPI ODG@C@@?JAOC@$DMD5 JMG?5 <M 1JH @DC@M@NDD BNDP?D@NJI >@M4DC<Q@=@@ M@@OGKP=GBDC@?=T 4D>@UJ" @ <KMDJA2PN>3 I D@@MDOT N@@ @ <KMD "PMD BCDNOM4Q@@D $DG<I ?D >@M4DOM4I N>MD=@NJH @ KJKPGMNJI BN%H>H AH>HAHE@<?AGH91G@K 1G@K DM?JÎ+ @?JRÎ: <I ?!BF@HA GHGGHA<GHF<9'A+ T @GQ@5 JPG?! JH @ &@<GNJ RMO@?JRI OC@<ND>H @G?TJAOC@NJI BN<I ?>JH KJN@NJH @JAOC@ JG?@ND>C<H=@MH PND>DI NKDM@=TMPI JNJI BNH PND>MDG=M<?><NO@ JI $DI DCM4?DJ AMH ODH@OJ ODH@

4E?B 4G4A8B4A7 G;8 9A<G8F58GJ88A) <G@Q<G<4A7 ?4FF6 C6#<GE4GE8

AO@M >@M4D! <MG! <OGI @ Ë RMO@@C@MD'G<GBI <MD DG@JI *•I I MJÔN@KD> "4?8 4?4 4AG6BCB8@4 78< <AA<9) <G@Q<G< I>D@OJ@HI JAOC@$DI NÎ KP=GBDC@JI ᶜᶜ+ <T D ? E8 CHF6B?B <R@@FGH<B<UD @JI OC@N>D@>@N<MDNG@M4OPM@N@@1>P ?D@D 2C@H<B<UD @NPKKJMO@OC@G<GBI 3 I D><ODI <I ? R<NAJPI ?@=T! <MG2@>< Ë NH<I T'G<GBI FI JRN AMH N>CJJG=JJFN! <OGI @R<NJI @JAOC@G@?@NJAOC@$DQ@<TN

? E8CHF6B?B R<NKP=GBDC@=@@R@@ <I ?
I JOC@MC@MJAOC@$DQ@'<TNJA+ DGI AO@MO<OC@R<N<ODD@<N<
EJPM<GBDCI ?KJGBDDBI &@NPKKJMO@OC@DHKMQDBJAOC@@P><ODI NTN@H

JA+ DGI <I ? AJMOC<OC@R<NAJM@ OJ OC@@SDG@D 1RDDM@GI ? &@
NPKKJMO@ OC@D?@JA<A@@MGOGG<I ? C@R<N<>JI QDD>@ M@KP=
GD<I RC@ C@R<N@@@@ AJMOC@ <MGBH@OJAOC@ DB?JH JA'GG
C@?D?I JO@@MOC@=PDGD B=@<PN@C@?D?I JOR<I OOJ NR@M@ ?@@DOT
OJ OC@G<GI FDB *DF@H<I TK<OMDOI ?DO@@@<OP<GJA ODNOH@
! <OI @JGJO@ #PMK@I @KD>GD@<OPM@D OC@D êP@OD GJH@ODê>
M@D@R ?' B?G?6A<6B AJPI ?@ =T! <OI @ ODH N@A C@RMO@<=JPO
OC@ ?64AG4E78@LBS<7 9í2 C@ J@H JAOC@ D'Î: <I <I JI THJPN
#<M' =@DI KJ@H AMJH >< <I ? &F#HF474F9í2 C@ PNB?NÎ:
=T* PN4<U?@ <H€@N Ë

'I ODK@DG@<=JPO" 4?4 4?4 ! <OI @ DD>G?@NDM I NGODI NJAJH@
Q@M@AMJH 0 PI JN <I ? JAOC@éMO@DDI JAOC@
" 4?4 4?4 I JR FI JRI <NOC@&?7 " 4?4 4?4 &@KM@D@NOC@
ÏNR@@D @NJAOC@$DI DCG<BP<B@D<I ?ODBOBON OC@M@@I >@JA
<GD@MODI D OC@NPI JNJI BN#Q@ DAC@H @R OC<O* • I I MJO>JG@@O@
OC@NJI BNJI GNJH @?@<?@N=@AJM@C@?D?I JOC@ND@<OC@J >JHK<M@
OC@ 4?4 4?4 RDOC OC@ G<NDH<NO@KD@@N >>JM?D BOJ ! <OI @J
Ï2 C@ 4?4 4?4 DK M@GD>JA<I >D@ ODH @NK@MC<KN J G@N<I >D@ OOC<I
OC@DH @JA& JH @D >D D 1>P?D@D &@éI ?N<AéI DD@N
=@R@ OC@>JPI O@NA@H<G@NKDDONJAOC@AJM@N<I ? OC@R<O@M<I ?
OC@?MT<?NI <B?N<I ? I THKONJA%M@@H TOJGBT

'ORJPG? GF@OJJ HP>C ODH @OJ <I <GIN@OC@N@M@<I ? @D?@O
M@NJI <I >@D OC@H TOJGBTJAOC@N@@OM@H @&TK@4JM@I N9 :OC<O
M@H D ?NPNJAOC@?@D@NJA%M@@<I ? 'GG9 :'I OC@$DI DCNJI B
OC@M@DN<I OJ FDBJAOC@R<O@NI RDOC<=@M?H<?@JAN@R@?@ GF@
JI @JAOC@M@@ BJ?NJA%M@@<@2 C@MOD<BJJ? NKD@D9 2<KJ: <FD
RDOC 1DGI PNJM <I RCJ H<?@OC@GI @GF AJM@NDM@NJI <O@RDOC ODN
êPO@ODN?<PBOO@MOC@ THKC 2 @@@OJ C<N<?M@NJA AMJI ?N ! DD
D 1>P?D@D

2 C@M@D@MJA2 PJI @G<M@H D ?N! <OI @JAOC@@ DD@MJOTSJAOC@
8A87 JMJAOC@A9EABJA" <I O@& @N<R * JPODM@DDDB C@H K@ND<N
N@H DGMOJ (PI J RC@ NC@R<N@ M<B@<I ? 1<H KN<. @@@@OJ D @ R<N
AJMODH <I <G@M@BJ JA1<OPMIPN OC@ <OD BJ? JA<BMD PGPM@&@

A@MOC@3 I D><OD D OC@) DB 4DOJM#HH<I P@G JA1<M?D D<
R<NKM>GDH@) DBJA'GG 2 C@) DB?JH @?@D RC@ 'G<GI NJKO@
AJM< 0 @KP=GD<I ! JI NODP ODI
'HKM@DDI =T! <OI @ DONCJPG? =@ OOD

J=N@M@?OC<OOC@J<FR<N<N>M@OM@@JOJI GFOJ $DI N=PO<GJ OJ ! @GN%M@@N0 JH<I N<I ?%@MH<I N$JM! <O<I @J OC@HTOCJGBT JA" 4?8I 4?4 R<NK@M@?@=T! GNND<GK<M<G@GNRCD>C@LP<O@NJ N@@ DBNDHDGNDDDDNDOC@C@MD>B@JA$DI N I>D@O%M@@<I ?0 JH<I N <I ?'GG<I NRDOCDHKGD<ODI NJA<Aé I DOT=@OR@@ OC@HI &JR@Q@M ! <O<I @J?D?I JO>JI NDM<DI ODN>JI ND?@M<ODI NJ <>>D?@GGK<M<G@GN <I ?KPOAJMR<M? OC@KJNNDHDBOT JAHJM@?DM@O>JI I @ODI N 2C@ ÍA@@DBAJM<OPM@@GK<M@NN@?D OC@Q@MM@NJA" 4?8I 4?4 M@HDI D?@ ODH JA%M@@=P>JGD>KJ@OMT & @?<M@?OJ CTKJOC@NDM@OC<O<I >D@OKJKP GM, JM?D>KJ@OMT>JPG?C<Q@=@@<NJPM<@JAD NKDM<ODI AJM&E'4A7B HE<BHB9Í2C@$M@UTJA0 JG<I ?Î: =T* P?JQD>J MDNJ Ë JM=TOC@OM?DDDI NJAGDOM<OPM@AMH RODC&E'4A7B HE<BHB ?@MDQ@N

> 1JH@JAOC@N@ODI BNK@@M<O@? =TOC@R<TJA, JM<I <I ?$M@>C I JQ@@NDDJ OC<OI PM@MOTJAA<I GNDMNJA@Q@MT<B@<I ?JMBDD OC<ODN OC@@KD>KJ@HI =T* P?JQD>J MDNJ OC@GNO<I ?HJNO?<MD BM@NDJM@M JAOC@N@M@Q@ODN ! DD D 1>P?D@MD

! <O<I @R<N<GNJ OC@éMD'GGG<I OJ @GK<M@NNODNCJK@AJM<>JH K@@O@M<I NGODI JAOC@ 4?8I 4?4 <I ?JOC@M$DI D>NJI BND OC@APOPM@ <CJK@OC<ONCJPG?=@N@@ RDDD OC@>JI OGJOJAD OG@G@OP<G<I ? KJGDD<GOM@?NJAODNODH@" PMD B OC@@M<JA, <ODI <G0 JH<I ODDH OC@M@R<N<RD?@GH<DGD@OC@MTJAOC@<I ODLPDOÎ JAOC@ Q@MM@NJA) <G@Q@G=JOC D $DGI ?<I ?D OC@M@NDJA#PMK@! <O GI @ÎNM@@ODI NR@M@OKD<GJAOC@ JH<I OD>HJQ@H@OOC<OR<N I JOJI GI <ODI <GDO=PO<GJ D OC@M<ODI <GI ?JK@ HD?@ DOC@G G@OP<GNP?D@OC@GDOM<OPM@<I ?AJGFKJ@MTJA?DAA@M@C#PMK@I K@KGNDD ?@GDG'ONCJPG?=@I JO@ OC<ONJH@<NK@ONJAOC@@ J H<I OD>K<ONDODH JA ©<I ? ©>@OPMTR@M@LPDO@?DAA@M@OAMH OC@HJM@BBM@NDQ@<I ?@OI J>@OMD<I <ODI <GDH @GK<M@NN@?=TKJG DDD<GHJQ@H@ONJAOC@AJGGRDDB>@OPMT'ODN@Q@?@OOC<OOC@@G DI NRCJR@M@OC@HN@Q@NODPBBDHBAJMI <ODI <GPI Dé><ODI <OOC<O ODH@C<?<R<MH NTHK<OCTAJMOC@@KD>NJAJOC@MK@JK@GN@M<ODB AJMI <ODI <GDD?@K@?@>@<I ?D?@ODT %@MH<I 'G<GI %M@@ 1GGQD><I ?$DI DCÍK<ONDOÎNC<M@<>JHHJI DO@M@NDD AJGFGJM@ <I ?GDOM<OPM@DNKDM@=TI <ODI <GOM?DDDI N&JR@Q@M! <O<I @ÎN >JHK<NDJI JAOC@" 4?8I 4?4 <I ?! GNND<GKJ@MT<?Q<I >@N=@JI ?

OODN C@N@@HNOJNPBB@NOOC@@DDNO@>@JANJH@FD?JÁ<M<C<D>NKDM DDP<G>JHHPIDJIÎ=@OR@@ OOC@<I >D@OK@JKG@NJA1JPOOC@M <I ?
, JMOC@M #PMJK@

+;8+E4AF?4GBA B9, PKODBG1JIBN5L AGBA<B#4@<

2C@éMOK<MODG GGBI OMI NBODJI JA<N@@@ODJI JAH<MBB@NJIBN AMJH OOC@%8J "4?8 4?4 R<NKP=GBDC@D =T. MJA@NNJM IOJID *<HD2CODNOMI NBODJI R<ND KMJN@<KK@MDBD *<HDÎN K<B@=JJFG@D 4?"4?8 4?4 E4@@8AG<74:?< XXEHABGB64AG< AHM4?<9Í$MBH@ODNAMJH OC@ XXEHABGJM, PKODBG1JIBNÎ 2C@ =JJFG@DR<NKMD OO@DJIG >JKD@NAJMOOC@ÍC<KKTH<MBB@JA IOJID @MOG<>>D<I?!<MBOOD<'INJH 2C@@D@N<M@JOOMI N G<O@AMJH $DIDC =POAMJH OC@$M@>COMI NBODJI JA*vJPUJI *@ "P>'I'G<GT *<HDDNM@JRI@AJMODNOMI NBODJI <I?@DDDBJA 64AG<7<:HEE4 89E4@@8AG<9Í5 <MLJIBN<I?$MBH@OOÎ =T OC@1K<MBI KJ@2TMB@PN'I ODND OM?P>ODJI OJODNOMI NBODJI JA @>@KOMAMJH OC@ 4?8 4?4 *<HDODBOGBOONCJROC@ 4?8 4?4 GHF@ OC@&JH@MD<I?'I?DI @KD>NR<N=<N@JI AJGFNJIBNJA?DAA@M@O <B@NHI ?M@BDJINN@@2<MBDJID2JUU@DD OOC<OODH@OC@ "4?8 4?4 R<N<I DHKJMBI OM@A@@>@AJM>CJG<MND OM@N@D OC@ &JH@MD>LP@NDDJIN<I ?LPDD@JAO@ *•IIMJOR<N>@@<M@@ <N< Í>JI O@HKJM<MT&JH@MM

+;8$MBH@ODNAMJH 0PIJ 5L&GG4I<4AB+4E<BA<+BMM8GG<

IJOC@MODMI NBODJI JA @H@NAMJH 0PIJ 2C@ @OCJA)PG G@MDJ R<NKP=GBDC@D =TOC@KJ@ORMD@MH?OC@>C@M OC< ODI J 2<MBDJID2JUU@DD Ë &@?H<NO@MJAOC@ G<NNDD<G *T>@PH JA*DOJMJ'OR<NKP=GBDC@JI OC@G><GH<B<UD@?$ 4E8 4MM8GG<AB8FG<B D RODC OOC@<POCJM<GJ KP=GBDC@<>MDDDLP@JA *<HDÎNKMJN@OMI NBODJI 2<MBDJID2JUU@DDDOMI NBO@OC@OOOD OC@ C@?@<NTGG=G@H@M@OC<OOC@ G<NNDDDO GGBI 1>CJJG>JINDD?@M@ HJND<KKMJKMB@OAJM<I @KD>KJ@H 2C@OMI NBOJMR<NH@I=@MJA OC@ @6<' 874AG<9Í. @<I OD>$MD@?NÎ <G@O@MT>DAG@JAKPMDO

! G<NNDDON RCJ AJPBCO<B<D NOC@ÁJM@BI D Q<NDJI D * D@A4OPM@
<I ? OC@@? @>D@NJA* <@0 JH<I ODDH OC<O OC@T >JI ND?@M@?
ÍDHJM<ÎÎ<I ? <@J Í@J OC@ G<GBI B@DPNÎ 2C@ 4?8I 4?4 RODCR<N
D M@BDT < KM?P>OJA OC@$DI DC 0 JH<I ODDH R<N<?HDM@ =T
2<NBJI D2 JU@DD=@<PN@C@>JI ND?@M@?DOJ =@<Í! G<NNDÎ@KD> <I ?
OC@>CJD>@JAOC@C@?@<NTG=G@H @@MNCJPG?=@QDR@?D OC<O
GBCO

' I NKDM@?=TOC@AOC@M2<NBJI D2 JU@DÎNJI %DJQ<I I D=JPBCO
$M<I U I OJI 1>OD@A @ÎN%@H<I OM<I NGODJI JA" 4?8I 4?4<I ? * vJP
UJI G@ P>ÎN$M@>COM<I NGODJI RDOCOC@DO@ODJI JAOM<I NGODBOC@
RCJG@@KD> & JR@Q@MC@KP=GDC@?JI G<OM<I NGODJI JA0 PI J
PI ? @MOC@DDG@#4FGBF47<?@4E<A8AB92C@5 DA@JA'GH<ND@DÎ: 2<M
BDJI D2 JU@DD

AGBA<B B4MM<EB4A7 G;8) <@Q<G +;8+E4AF?4G<BA 4A7 + oGB<ND

2C@A<HJPNKJ@D RMD@M<I ? N@<OJM I OJI D $JB<U<MJ Ë
H<I TODH@N<><I ?D?<C@AJMOC@, J=@G MD@AJM* D@@4OPM@
C@G<NK@BG<KKM@BODI JAOC@ 4?8I 4?4 & @B<Q@<G@OPM@JI OC@
@KD><OC@ >><?@HD- GHKDJA4D@U<@DOD@ 8AA<FH?8CBC84
A4MBA4?8¹ AA<649- I OC@$DI DC, <ODI <G#KDÎ: 2CDN@OPM@R<N
KP=GDC@D + DGI D OC@H<B<UD@? BAI8 ABD <I ? OC@
<B<D <OC@=@BDI DBJACDI OCJGBT$ <A<@8 <I ?
$JB<U<MJ R<NA<N D<C@?=TOC@?@N>MDODI JA$DI DC I <OPM@OC@
@KDÎNA<I G<NTRDOCJPOG HDDN<I ? OC@ÖKJR@MJARJM?NDD NK@GG<I ?
@>C<I OH@OD >DDD 5 DN & @RMJC@

' M@@Q@?OC@$M@>COM<I NGODJI JA" 4?8I 4?4=T* vJPUJI * @ P> ' R<N
T@MNJG? DH=P@RDOCK<NNDI AJMOC@ JMOC<I ? AJMAJG KJ@OMT
' A@GD GJQ@RDOC OC<O>JPI OMTJAG@N<I ? =D@C@NRC@M@OC@AMJND
@H=M<>@N<I ? AM@@N@OC@AJ<HDBR<Q@N<I ? OC@NPHH@MM<KD?GéGN

- I , PH=@N <I ? JA IIJ' T@M KP=GDC@ <I ? PBPNO
2<NBJI D2 JU@DDRMJC@RDOC OC@KN@?JI TH @B>LP< 2C@H<B<UD@
C<? G@DM<MT M@@@<I >@<I ? <GJ OC@KJ@O%DJNPu! <M?P>D KN@?JI TH #I JOMJ
0 JH<I J RMJC@AJMDD
& @?@<NTG=G@DOC@H@N@JA& JH@D>KJ@H <I ? JI @JAOC@HJNODH
KJM@I OD 'GGI KJ@OMT DNPM@=T" <I O@. @M<M< MDND 2<NNJ

OC@H@?JRNRDOCêJR@WI' R<N@>C<I O@?=TOC@KM?DBJPNAI GNT =T OC@?@D<O@<I ? ?@K A@@DBNJAOC@N@<I JI THJPNKJ@NRCJ >M@C@O C@$DIDC@KD>N9Ñ : ! JI ND?@MDBOC@BM@CKJKPGMKJ@HIN K@C<KNOC@%5?HA:8A?87 JQ@HJH@NOC@" 4?8I 4?4 =TOC@C<MHJIT =@R@@ DDNK<MDNAJMOC@PI DOTJANDP>GPM@<I ? >JHKJNDDDI =POOC@ " 4?8I 4?4 BJ@N=@JI ? OC@%@MHI @KD>NDD OC@MD>CI @NNJAOC@AI GNT DI OC@BM@CQ<MDOTJAKJ@D>OC@HI@N<I ? DI DDNKJR@MJ M@KM@N@O <I ? @DBQ@ OC@I <OPM@ ! DODI 5 DN

$JB<UUM <I <GNM@OC@>C<M>O@MN* @HIHDIFrDI@ <I ?) PG@MQJ <I ? ODNK<MD@D>GP?@NOC@ODHI NGODI JA Q@MN=<N@ JI OC@ $M@>COHI NGODI $JB<UUM <>>JHKGDC@?ÏOC@>PONM@LP@NO@?=T OC@M@LPDM@HI@OJA* <OD GNOD@AMJH <ODSOM@OJ# , 1@DGDI >DODI 5 DN 2C@ÏI , PKOD>G1JI BNDR@M@<AQJPMDO@ OJKD>JAOC@éMD'G<GI OMHI NGODI 2C@OMHI NGODI =T$JB<UUM DI >GP?@ Í1JI BJAOC@+ JOC@MÎÍ* <H@OJAOC@ MD?@Î5 @KDDB 1JI BÎ<I ?Í ?QD>@& @OMHI NGO@?DC@?@<NGG=G@>JI ND?@MD?OC@ @KD>H@M@K<M@S>@G@>@<I ? OC@HJMDNPDD=G@RDODI OC@ G<GI OM?DODI 1JH@Q@MN<M@KP=GDC@?DI OC@<MD>G@ AGB<B B 4MMHEB 8<?" 4?8I 4?4 9Í IOJI DJ $JB<UUM <I ? OC@" 4?8I 4?4Î: =T0J=@MO 5 DN

- é?<I U<OJ <NK@O<OPO<Q<
I JI KP~G<OP<>JHK<BI <KJMDD Q<
3I <H<I D<KPM @G<BDJ>JI ?<
Q@N@C<DéGOJ H<I ><G N@JI ?<

$JB<UUM G<O@MM@KP=GDC@OC@OMHI NGODI ND <=JJF@AJMOC@ R@?DBJA* <H=@MO <G=D RC@M@C@>@NPMDBAJMJ=QJJPN M@NJI NOC@Í* <H@OJAOC@ MD?@<I ? OC@Í5 @KDDB 1JI BÎ RODG@ <??DBNQ@O@ OH@NOJ OC@Í ?QD>@
'I OC@K<K@MKP=GDC@G<O@MJI OC@<I OCJGBT$ <A<@8 $JB<UUM ?@G@M@ ODN<?HDMODI AJMOC@KDJ?@D RODC4rDrH•DI@ KGTN OC@4AG88 <OM>ODBQ@MTGODB=@DB<I ? OC@MKDMDNJAOC@I <OPM@ 0PI J & @DBCOBCON<Ï 0PI J JA" 4?8I 4?4 ?@D<O@?@

2C@OMHI NGODI >JMM@NKJI ?NHJM@JMG@NNOJ OH@NaËàáã <I ? àâßËáâß JA 0PI J <I ? àèËáâß JA0PI J
2C@Q@MNDI =T* vJPUJI * @' P> R<N JO>JHKG@@I JMK<MDDPGMG OM@J OC@JMDBD<G
* DI @NàâßËáâß AMJH 0PI J

ODM@FJ OC@KDN?@JAOC@NJI BJA5 rDrH•D@ DNJ=@JI ND?@M@ JI @JAOC@HJNONDDBE@R@GJAOC@KJ@DD<MD $JB<UU<M 'I 5 DN Ë

2C<O@KDNJ?@D NKDM@ OC@NCJMI JQ@G$ V?4E<B?4 C8E?4 @4E<A4 9Í+ oGB<MDOC@ @MGJAOC@1@Î: <N$JB<UU<M H @ODI @D ODNO@SON@ OJ 1@DG

> 'I OC@=@BD I DB OC@M@DN<I <GGNDI @Q@ DAODNI <H @DNI JOH @ ODI @ OJ OC@BM@ONDB@M5 <D<HJD@ RCJ KG<TN<I ? NDBN<I ? D@MB@NRDOC ODNJRI NDBDB NJ OC<OD OC@@? OC@Nê JR GF@ MDD AMH ODN@T@N<I ?KJPMDOJ OC@N@ RC@M@OC@T<M@OM NAJNH @ DOJ K@MGN >DOD 5 DN

2C@I JQ@GPI AJG?NRDOCJI @JAOC@N@K@MGN=@D B><MD@?=TOC@ R<Q@NJAOC@N@<GGJAOC@R<TOJ 4 @D>@RC@M@D OC@ ^{OC} >@OPMT OC@ JB@ éI ?NDO<I ?BDQ@NDO<N<KM@N@OJ ! JI G<MD<! JI G<MD D< G?TRCJ C<? GNDC@M?<PBCO@M HDM>G@OM<I NAJNH NOC@K@MGNDOJ <=@POOD@PGBDMGRDOC=DBCONFD <I ?=GP@@T@N + oGB<MD'I <?M@H ! JI G<MD<DNDAJNH @OJ F@K+ oGB<MD<R<TAMJH HPND<I ?KJ@OMT JMNC@RDGGJN@OC@BDMGAJM@Q@M GOCJPBC! JI G<MD< GF@N<GOC@ KJNND=G@KM@<PODI NOJ <QJD?OODNDD 4 @D>@+ oGB<MDA<GNDGJQ@RDOC <HPNDDI AMJH OC@?DNGI OI JMOC 3 I AJMOPI <O@GT OC@BDMGNJ=GB@ OJ<>>@KOGI <MAI B@H<MDBB@RDOCOC@ JB@' PMD BOC@N@QJT<B@ OJ OC@%M@FDNGI ? RC@M@OC@R@?DBNCJPG?GF@KG>@+ oGB<MD ?DNJQ@MOC@HPNDDI JI OC@NDK ?DBPDN@<N<H<MD@M2C@H<I O@GNC@M<=JPOODN?DNGI OCJH@GI ? ÏÍ9 : <>JPI OMTKJJMDBJG?Î >JI >GP?@ OC@TJPI B H<I Í=POMDCDD ORJ JAOC@HJND=@POOD@PG OODBND OC@RJMG? HPND<I ?KJ@OMTÎD $JB<UU<M >DOD 5 DN 2C@HPNDDI R@OJI OJ?@NMD=@

> <H<BI Dé>@OKJ@I JAODNCJH@GI ? RCD>C R<NNDDGNPI B =T OC@ K@KG@<MJPI ?OC@C@MOC?PMDB OC@>JG?N@NJI <I ?JPOD?@JI OC@ H@?JRN JI OC@êJR@MDBNCJM@NJAOC@GF@N JI OC@NCJM@NJAOC@ N@?PMDB OC@NPHH@M I ?C@OJG?OC@HJND=@POO@PGK<MONJAOC@

0@KP=GDC@D OC@I OCJGBD@N) 466BAG<5E8I< <I ? 7<?<FE8MM4G<) 466BAG<5E8I< KK Ë

! OD@AJA1G<O@JAOC@0@KP=GD>JA4 @D>@@@O@ =T<MDDJ>M4ONJAOC@ %M@O! JPI >DG<AO@M<>JHKGD<O@@@@ODQ@KMJ>@PM@

OOC<OODH@4 @D>@BJQ@MI @ N@Q@M4G%M@FDNGI ?NDD>GP?DB! M@@I ? ! TKMPN

KJ@H NOJMN@NJAGQ@C<O@K@<>@<I ? R<M'I OC@@I? C@OJG? C@MOC@
NOJMT JA<BM@O<I ? BGHMOPNJG? H<I <KJ@O<I ?) DB RCJ RC@
NDBD BJI OC@NCJM@R<NHJQ@ =TODNJRI NJI B<I ? R@KO<I ? OC@
O@NNMG@@ ?JRI DOJ OC@N@ =@JHDB K@MNI $JB<UJ<M
>DOD 5 DN

2C@HPNDD<I <GNJ KG<TNOC@H@G?TJAOC<ÚJG? KJ@ÔAJM+ oGB<MD
RCJ R@@KN<I ? OPMIN<ND?@OJ <QJD? =@DB N@@I DOC<ONG<O@5 C@
OC@HPNDD<I <KKM<>C@NOJ N<T BJJ?=T@OJ C@M C@éI ?NJI G <
C<I ?F@MODA R@ORDOOC@O@<MNJAOC@H<D?@ 2C@KMJKC@TJAOC@
?M@H JA I JI G<MD <OOPN>JH@NOMP@
'I $ W?4E<B?4C8E?4@4E<A4 $JB<UJ<M NP>>@NMPGGOM<I NAJMH N<
NDHKG@DNKDM<ODJI AMJH <G<G@JAOC@' 4?8I 4?4 DOJ <MJH<I OD> @S
OM@H@GTN@ODH@<G<I ? C@MOM@?DB 'G<GB<I G<G@RODCD>CD>G?@N
<I @KDJ?@JA<I DHKJNND=G@GQ@OC<ODNM@HDDN>@OJA1C<F@NK@MÔN
) B@8B4A7!H?8G2C@HPNDD<I JAOC@ JQ@G@@HNOJ=@<I Í<I >@NOJMÎ
JA MODKK<. @NOPI @ <I ? JOC@MNPI JNDB@MNH@O=T* • I I MJO<I ?
AMJH RCJH C@>JG@@@@ OC@KJ@OMTOC<ORJPG?=@JH@OC@' 4?8I 4?4

B@8A<6B B@C4E8G<4A7 G;8 C6B9 ;4E@F

'I OC@AHJPNKODG<JBDOOK<KTMJGBDOO<I ? @KDBM<KODO' J
H@D>J! JHK<M@OD Ë KP=GDC@<HJI JBM<KCOC<ORJPG?
N@M@<N<>JMI@MNJI @AJMOC@HJRG@B@<I ? PI ?@MN<I ?DBJAOC@
" 4?8I 4?4D 'G<G<I ?#PMJK@! JHK<M@ODR<NJI @JAOC@HJN=MDGB<I O
'G<GB<I DOC@@G@OP<GNJAOC@ ᶜᶜ>@OPMT 'I C@=@<H@OC@ C<DM
JA I >D@O%M@F* <I BP<B@<I ?* DO@M<OPM@OC@3 I DQ@MNDOTJA DN<
D C@=@<H@OC@>JMM@NKJI ?DB! C<DM<O3 I DQ@MNDOTJA$GJM
@>@& @R<N=G@OJ KP=GDCHJI JBM<KCNJI OC@HJN?DQ@MN@OJKD>N
'I *4: :<78<74?8G<:E86<78?®G4?4 @8E7<BA4?89Í#S<HKG@NJA%M@F
" DG@ONJA1JPOC@M 'G<GÎ: C@NPMQ@N%M@F@H BPDNOD>HD
I JMODD@ND ! <G=MB<I ?D OC@M@<MJPI ?- OM<I OJ 'I 7<CB8?4@<
GB?B <4 6B@C4E4G4 F4: :<B6E<G6B9Í- @DKPN<I ?! JHK<MODQ@+ TOCJ
GBT ! MODD<G#N<TÎ: C@>MODDDJ@NIOP?D@NJAHTOCJGBT
=<N@JI NDHKGÉ@>JHK<MODQ@HBPDNOD>N<I ? M@@@ONOC@OC@JMTJA
OC@<OPM<GDNOD>DO@KM@OODI JAHTOON<I ?D K<MODPG<MOC@ÍNJG<MÎ
J=N@NDI JA+ †G@M- <E<?<BA8?$ 87<B IB OM<I NG<O@ DOJ

#IBGBC - 8E<?<AG;8$ <77?8 :8D JA@@K<>JI >D@<>>JPI OJA G@D@MT>PG@PM@AMIH PBPNDPNJ" <I O@<I ?=@<H @<>G<NDJA>JH K<MOD@@G@D@@MOPM@! JH K<M@DDR<N<GJ Q@T<>ODQ@D <M<C<@JGBT C@ <I <GN@ OC@K<KTMDJA& @M<PG<I PH <I ? @>JPMB@ OC@ G<GB<I BJQ@MH@OOJ éI <I >@OC@B><Q<ODI ND! M@@OC<OG@OJ OC@?D>JQ @MTJAOC@+ DJ<I DN>NBKODI NJA%• MOI <

! JH K<M@DDÎND O@@MD <I ODLPDD@R<N K<M<G@@@=T<>JI NG<I O K<NDI AJMAJG>PG@PM@KJ@MT<I ? KJKPG<M@D@@MOPM@Ë OJKD>NOC<O A>NDD<O@H <I TDD O@@G@OP<GJAOC@OJH <I OD>DH 'I C@KP= G@C@) <8E6;8<AGEAB4??5EB7<*<A7<547 OM<I NB@O@<N) 8F84E6;8F) 8F68G<A: G;8 BB> B9*<A7<547 D <I ?%B8?<A8OBOB4E<<G4 ?4A89́'G<GB<I $JG2<G@Î D 5 DOC G@N<I ?MJ" Î I >JI < C@ @D@@OC@<I OCJGBTJA'G<GB<I AJGKJ@MT AG6;8E<@8IB?4E<9́'G< GB<I $JG. J@MTÎ: Ë

AO@M@<MDDB0PNNB<I <I ? JOC@M1G<Q>G<I BP<B@N! JH K<M@DD OM<Q@G@OJ $DDG<I ? AJMOC@éMDDDH@D RC@M@OC@>JG@@O@< OPB@LP<I ODOTJAH<O@M@GJI OC@' 4?8 4?4 <I ? MPI JNJI BN & @PN@ OC@N@AJM<NK@@CH<?@JI + <T AJMOC@ I I P<G+ @@D BJA OC@ >><?@HB<?@D* D>@D 0 JH@ AO@MOC<OC@KP=G@C@<GI B Í+ @HJMBÎ9́<I <MDDG@D H@HJMTJAOC@NK@@CÎ: RCD>C R<NOC@ HJI JBM<KC ?' 4?8 4?4 B?4OB8E<4GE47<MBA4?878< <AA<*GH7<BFGBE6B 6E<G6BFH?8BE:<A<78?8:E4A7<8OBOB8A4MBA4?<9́2C@' 4?8 4?4 <I ? OC@ 2M<?DDI <G J@MTJAOC@$DI N ! MDD<G& DOJMD<G1OP?TJI OC@ - MBD JAOC@%M@Q <ODI <G#KDÎ: 'I OC<ONH@T@MC@R<N JH D<O@ N@<OJMJAOC@G<GB<I) DB?JH 2 ODNHJI JBM<KC R<NNP= N@P@OGKP=G@C@D %@MH<I OM<I NG@DDI <I ? OC@ D #IB G@C " 4?8J 4?4 4A7 G;8+E47<GBA4?' BBGL B9G;8 <AAF 2C@N@ ORJ @DDDI NKMQJF@BM@ON>D@OD>?@<O@ND #PMK@

2C@K<NDI AJM$DI DC @KD>KJ@MTDJ=QJPNG>JI I @O@ OJ ! JH K<M@DDÎNB@@M<GD O@M@DD #PMK@<I AJGNJI BN<I ? G@D@MOPM@ =<N@ JI AJG I <M<ODQ@N<I ? AJG KJ@MT & JR@Q@M" @ I I < ODBC G@BC ONOC<O JH K<M@DDRJMF@D 2 PN><I TAJM<GI BOD H@RC@M@OC@ %M<I ? " PF@ JNDHJ ··· ?@+ @>DR<ND O@M@N@D $DI DC G<I BP<B@N<I ? RC@M@#HDGJ 2 @K <AD@?JA! JH K<M@DDRJMF@JI OC@%B@8648GE¹ AA<6HFN@O=T+ <MDD $JB@G" @ I I < " @ I I <<GJ J=N@MQ@NOC<O@Q@ DA! JH K<M@DDR<N JOK<MDDPG<MG D O@M@N@D KJGBDDN

OHF@JOC@MGGBI DOGG@OP<GNC@AGG<NOMIBNTHK<OCTAJM$DGI?
=@<PN@OC@NDP<ODJI JAOC<O>JPI OMT?PMDB OC@T@MRC@ C@R<N
RJMFDBJI OC@HJI JBMKCJI OC@'4?8 4?4 9D@PI ?@MBJDB 0PN
Né><ODJI M@HD?@ODH JAOC@NOMPBB@JAOC@GGBI)<EE<@8AGB
'I JOC@MRJM?N OC@0PNNBI #HKDM@@Q@I D OC@N@ODH@NJAOC@2NMKG@
GGBI >@ R<N>JHK<M@RDOC OC@ PNONB &PI B<MT OC@@HKDM@<B<DNO
ROD>CH< TK@JKG@éBCOD OC@DMNOPBB@AJMA@@JH AJGRDBOC@
#PMJK@I DNO@@ODO QDDJI "@ II< Ë

5 C@ OC@KJGBDDNJA, DJGD' =@<H@JKKM@NNQ@D $DGI?<
BM@OI PH=@MJA#PMJK@I N>CJGMNM@O<K@DDDI OJOC@2N<MOJ<NF
ODH OJ M@NK@OOC@$DIIDC>JI NODPODJI <GMBCONBMI O@=TODKM@
?@@NNJM G@<I ?@M HJIBOCJN@RCJ NDBI @<M@ JHK<M@DD
*JH=MJNJ $@MM@M 4DGGMD<I ?! <M?P>>D" @ II<
. MJA@NNJM) <<M@) MJCI D<M@@NDJI JAOC@%@MH< I @D
ODJI JA ?'4?8 4?4 RMJO@OC<OI JHK<M@DDR<N=G@OJM@?OC@'4?8
I 4?4 D OC@JNMBD<GGI BP<B@NR@GGNOC@N>D@OD>KP=GD<ODJI NJI
MPI JNJI BND $DIIDC <I ?OC<OC@C<?<GJ@$<HD@D ?@KOC<BM@O
K<MOJA$DIIDC@GD@MOPM@) MJCI 2ODND AJMH<ODJI DN<A
éMH@ =T. MJA@NNJM(JPFJ &<POG RCJ RMJ@OC<O! JHK<M@DD
G@M@$DIIDCD JM?@MOJ M@?N>D@OD>G@D@MOPM@JI OC@'4?8 4?4
<I ?MPI JNJI BN&<POG >DOD ?@ II<
'I ODNM@@NDJI) MJCI <??@OC<OOC@GGBI KODGGBDO OHF@
JOC@MAJM@BI N>CJGMNOJJFDOC@M@NDD "4?8 4?4 RC@ C@R<NOP?T
DBOC@&JH@MD>LP@NDJI 2C@$DIIDCN>CJGMJ=N@MQ@OC<ON>CJGM
NODKJI OC@&JH@MD>KJ@HINC<?=@@ ?DQ?@DOJORJ><HKNAJMORJ
CPI ?M@T@MN4 OC@N>CJGMN>JI QD>@OC<OOC@?47<I ?OC@&7LFL
RC@M@RMDO@ =T&JH@MJMKOG@ND=T<NDBG@KJ@O <I ?5 OC@
N>CJGMNRCJ CTKJOC@NDD@ OC<OOC@KJ@HINR@M@OC@<IJI THJPN
M@NPGJAOC@éB@DPNÎJAOC@%M@FK@JKG@I OC@M@@O?@<?@NPKOJ

2C@KJGBDD<G<I ?<MH@ =<OOG@NAJMOC@PI Dé><ODJI JA'GG
2C@2NMKG@ GGBI >@R<N<HDB<MT<GGBI >@=@@R@@ %@MH<IT PNONB
&PI B<MT<I ?'GGOC<OGNO@AMJH PI ODG 'OR<N<M@NKJI N@OJ OC@2NMKG@
#IO@O@OC@<GGBI >@=@@R@@ NDBD $MI >@<I ?0PNNB
'M@@ODH DN<KJGBDD<GKJNDDJI <>GDH OJ <?E<>@O OC@MDJMD@NJI OC@
BMJPI ?NJAODNOJMD<GOB BPDDD>JM@OI D><NJ>BODJI 2C@RJM?R<N>JD@D
'GGAMJH OC@KOM<N@G4?4<EE87AG9ÍPI M@@HI@'GGÎ: 2ODNJMBD<GFM@M@M@
OJ PNOMJ &PI B<NBI NPG@JQ@M@MDJMD@NHJNOGFJMK<MOGFDC<=DO@ =T'GGBI N
NP>C<N2M@ODJ 2MD@N@%JMDD 'NOMB 0DB@<<I ?"<GHI<OD ?PMDBOC@ OC
<I ?@MG OC >@OPMD@N

OC<OODH @=JOCJAOC@NdK<MDDNÎPN@ OC@ 4?8 4?4 <N<Í>JI O@HKJM4MT
KMJÂDD A<QJPMJAOC@DMMNK@DQ@OC@JMDNJI OC@&JH @MD>LP@NDJI
+ <I TR@MD>JI QDD >@ OC<OOC@KD>KJ@H =T* • I I MJO?@HJI NDM4O@
OC<O< GJI B <I ? PI DD@ KJ@H >JPG? =@OM4I NH DD@ AJM>@ OPMDN
OC<I FNJ OC@JMGH @HJMTJA<I DDBD@M4O@K@JKG@JM>M@O@ =TOC@DM
>JG@DQ@AJMN) MJCI >MDDHD@ OC@N@N<CJG<MNKJDDOD BJPOOC<O
OC@T?D?I JOD A<>OFI JR<I TODD B<=JPOOC@>OP<GNMP>OPM@<I ? OC@
KMJ>@NNJAOC@AJMH<ODJI JAOC@" 4?8 4?4 &@J=N@MQ@ OC<OOC@DM
OC@JMD@R@MLPDD@NDHKGDDD>D<I ??D?I JO>JI NDDPO@KMJAN) MJCI

'I >JI OM4NOC@KM4DD@ OC@NPNKMDDDBKM@DDDI ÐJA JH
K<M@DDNI <GNDJAMPI JNJI B<I ? OC@>G@MDDBPDDMDD>@KJNDDDI JÄ<
OJKD>JAN>C>JHK@DDOFD) MJCI

'I OC@GNOK<B@NJAODNHJI JBM4KC ! JHK<M@DDOCDHN@ANO@MGT
>MDDDHD@ OC@MJH<I OD>DD O@G@OP<G>JI QDD >@ JAOC@@DDO@>@JA<
Í>JG@DQ@AJG @KD>BODM4OPM@

<I @KD>KJ@H >M@O@=TOC@K@KG@?J@N JO@DD9 : #O@MT@KD>KJ@H
<I JI THJPNJM JODN<I DD?DD?P<GRJMF JA<MDDD>JPG? =@ODBC I J=G@
<I ? K@M4@OGF@JI @JAOC@&JH @MD KJ@HIN JMHJM@JM?DD<MT<I ?
DHKJO@DDC@ GF@OC@JI @JAOC@KJ@HNJAOC@+ D??G@ B@N=POLDD
DN<GR<TN<MD ! JHK<M@DD 9 :

1J OC@" 4?8 4?4 NCJPG? I JO>JI ND?@M@ <Í$DDI DDCÎ KJ@H =PO<
GDM4MTRJMF JA<MD>JHKJN@=T* • I I MJO

2C@M@DNI J JMB<I D>PI DDTOJ OC@" 4?8 4?4 RC<OR@C<Q@DN<KG<I JA>JH
KJNDDDI <I JM?@MJA@KD>H<O@MBG=PO9OOD DJM?@MDN LPDD@NPK@M4>D<G
RDDCJPOMJJOND OC@H<O@MBG<I ? @DDMG =<N@ JI OC@>JG@OJMN
D?@N'ODNQ@MT>G@MOC<OOC@JMBDD<GKJ@HNKG>@DD OC<OJM?@M?J
I JOM@GF M@NKJI ? OJ OC<OBDM4MT>JC@M@>@<I ? OC<OOC@KGI R<N
<GDD OC@HDD? JAOC@>JG@OJM ! JHK<M@DD 9 :

! JHK<M@DD<??@<I JOC@MM@@DDI OC<ONJPI ?NLPDD@HJ?@M

@CJPBC$DDI DDCDD <GDON@@H@ON=JOCKJKPG<M<I ? OM?DDDI <G OC<O
O@S9D@OC@" 4?8 4?4: OOPN<NM@H=@?DNOC@M@NPGJA<>PGPM@HDD?
JAOC@ © >@OPMT , JO MODK< I JM4 I OM@DI JMLDNNI @ I JMJOC@M

I Í@KD>KJ@HÎ AJM JHK<M@DDN<GDM4MT>JI >@KO<GJI B OG@OGF@OC@
" 4?8 4?4 JMOC@?<47 JM<GJI BJMGKJ@H

2C@#I BDCOM4 NGDDI JA! JHK<M@DDNOG@ND OODN<MD@M@=T4 @N<
+ <OO@ . DG?P

JAOC@HJNODNKDM@<I?NFDAPG$DIIDC?4H?4=4F9ÍMPIJNDB@MÎ JMG3 GX=F9ÍN@MÎ >JPG C<Q@>M@C@ OC<OFD?JA>JHKJNODI D OC<OAJGF KJ@OMT R@?JIJOéI?ODBCK@FNJA<MO<I?H<OPMOT<I?NP>CMDC I@NND @KD>KM?P>ODI OC<O<GIRNPNOJ éBPM@JPOOC<O<?4H?4=4 RJPG >JINDP@M<BM@CKJ@HI <I?@@DAOC<CKJ@DD>JHKG@DOT@DM@ R@ >JPG IJONTRC<OFD?JAKJ@HJMKJ@HNDOHDBCOC<Q@>M@C@ PO JI@OODBDN>@MHD OC@MNPGNCJPG IJOC<Q@=@@ OC@"4?8I4?4JM <I TOODBRDCOC@<PM<JAOC@"4?8I4?4 !JHK<M@DD 9 :

3I@F@H<IT>GNNDDMD<I?MJH<IOD>DOC@@@OP<GI!JHK<M@DD ?J@NIJOK<DIO<I D?@<GKJMOMADOJA*•IIMJO<N<>JIOC@HKJM<MT&J H@M-IOC@>JIOM<MTC@OMD@NJOCDBCOBCOOC@?DAA@MC@>@N=@R@@ !GNND<G@KDN<I?OC@$DIID>KJ@HIN

IJOC@MI JH<GKM@N@ODOC@"4?8I4?4 DA>JHK<M@RDCOC@@KDNJA JOC@MK@K@NDNCJRA<MM@HJQ@OC@KGODNAMJH ODNOJMT 2C@C@M DN<H<BDDI IJO<R<MDMJM<NDI <GOC@BM@O@KDN 2C@BJ<GJAOC@ C@MD><ODI DNDI?DD?P<GI JO>JGG@DQ@JMI<ODI<G. @MC<KNR@>JPG >JIND?@MOC@<KOPM@JAOC@A4@OBJAI<ODI<GHKJMHI>@=PORC@M@ DNOC@<ODI RC@M@<MOC@K@K@NJA"4?8I4?4 DDODNKJJMGF?@I@ RJMG RC@M@OC@MODNIJOM<>@JA<>JC@M@ONJ>GJMB<IDKODI JM< KJNN=@ODNOJMT !JHK<M@DD 9 :

2ODNDN<OJKD>OJRCDC!JHK<M@DDM@PMINH<ITODH@NDOC@ HJIJBM<KC

9$DIIDCAJGKJ@MT ?J@NIJOFIJR<IT<POCJMDTOBC@MOC<I OC@AOC@M <I?OC@HJOC@M<FXAGX8@XAGX OC@?JHD<IOéBPM@NDOC@AHDGF FDB?JH N>C@>DT K<G>@><NG@FDB KND>@NFIDBCONI<I??<H@N <M@JOKM@N@ODONRJMG D?J@NIJOFIJR<IOODB<=JPOOC@N@ OODBNOC@M@DNIJLP@NAJMOC@N@D?@GNOC<O<M@<@OJDNDI<NKDM <ODINI!JHK<M@DD 9 :

2C@MJG@JAR<M<M@<I?I<ODI<GA@@HBNJMOC@K<NNDI<OC@KJG DD><G?@OODMG@C@OJ>DTN>C@NNJ>@OM<GD!GNND<GKJ@HINDN MG>@D$DIID>MPIJNJIBN=TOC@DHKJMG>@JAH<BD>

2C@H<BD>NJIBNJMOC@H<BD>EHAB?B>GFEHAB DNOC@HJNOM@@>IO KM?P>OOC@HJNO?DND>OD@H<MFJAOC<CKJ@MT OC@EHABDN<H<MF JA@>@G@>@DOC<NNPIFDOJOC@EA@JAODNK@K@>JHK@@GFDOJ DNM@BDPNK<NODOJONH@HJMD<I?D?@GN2C@MJG@OC@H<BD<G <>ODI C<ND"4?8I4?4<I?OC@M@@<I>@JAOC@BM@CIPH=@MJA>JH K@@H<BD>EHABFDN@@=T*•IIMJODOJOC@@SOMKMN@OR@G@OC@

> @3C@C<I ? Q<G'P@@C<OOC@D?@C<NAJMODDNK@JKG@<I ? DDN@KD>API >ODJI
> 2C@H<BD>NJI BDN<I J=QDJPNODD BAJMH<I TK@JKG@=POB@I@MGFDDN
> KJ@D>Q<G'P@DNLPDQ@BDDG@<I ? M@HJO@<I ? OC@KG>@OC<OOC@TC<Q@D
> OC@ODNJMTJAKJ@MTDND ? @@J=N>PM@<I ? M@HJO@C@M@DDI N@@? J>
> >PKD@NOC@HJNODHKJMI CKG>@<OMP@KJ@MT APG'JARJM?N<I ? >JI
> >@KONOC<OC<Q@@QJGQ@AMH OC@H<BD>NJI B <I ? <GJ OC@KJ@D>HTOC
> @QJGQ@AMH DD<NC<NC<KK@I@ @G@RC@M@AMH OC@N<>M@CTHI 'ODN
> @NT OJ M@JBI DU@OC@OM>@NJANC<H<I DH D ODDN?@Q@GKH@O>@M
> G@DGFOC@éMOM@BDJI JA$DI DCK@JKG@N<NDOR<N<I ? D K<MONDGM@
> H<DNOC@MOBDJI JAK@JKG@<I OOMKJGBD<GF<I ? GH BPDOD<GFM@G@@
> OJ OC@HI =JOC OC@ NBOD>K@JKG@N<I ? OC@#PMK@I N OC@NJ ><G@@
> 3MAG G@D>JM$DI J 3BM>K@JKG@NNP>C<NOC@*<KKN OC@- NOT<FN
> OC@4JBPG'NOC@+ JM?QDNOC@+ <BT<MNI@>2C@JI G<>ONRDOOC@JOC@M
> #PMK@I K@JKG@N<I ? OC@DêP@>@NOC<OAJGR@OC@N@>JI G<>ONË
> R@RDGG<O@MH <GN@NJH@NDBI N<I ? @A@ONJAOC@KC@JH@<ËR@M@
> I JO@3ODBPDDC@Ë<NC<KK@I@<HJI BOC@+ <BT<MNË OC@NC<H<I D>
> D?@G=POOC@THJ?Dé@DD ! JHK<M@OD 9 :

! JHK<M@ODDCIBCGIBCONOC<OH<BD>R<NKM@NI@OD @Q@T<NK@OJA
OC@H<O@M@G<I ? NKDMOP<GFA@JA$DI N

> <N<GR<TN<HJI B NC<H<I DMDD>K@JKG@N OC@H<BD>DI DN< C@G@MOC@
> K@JKG@BJ N@MODBAJMODH <I ? OC@H@D>DI @DN@A@ODQ@JI GFDAC@
> ÍGJF@ DDOJ DDÔ9Ñ: D@Í@>C<I O@@DDÔ9Ñ: RDOC ODNKJR@MAPGRJM?N
> F4A4G <I ? OC@OPI O@MOC@éNC@MH<I OC@H<MD@MOC@H<I BJDD BOJ
> R<MRCJ A@@GCJK@JMA@MH<I ? PI ?@MF@N@Q@I OAPG@I ?@QJPMNOPNON
> DD OCJN@RJM?N DHKGMDBOC@MC@K ! JHK<M@OD 9 :

! JHK<M@ODDN@OC@@ OC<OOC@MPI JNDDB@MFI JRN=JOC @KD><I ?
H<BD>NJI BN<I ? EJDDNÏOC@?DNKJNDOI JAOC@RD<M?<I ? OC@NDDB@MD
! JHK<M@OD 9 : &@PI ?@MH@NOC<OOC@NC<H<I D>?MPH
R<NI JODPN@<HJI BOC@$DI D>K@JKG@N=POD DNKG>@êJPMDC@
OC@H<BD>KJ@MT RODCÏ=@<H@KJ@D>NJI B B@I@MODB<I <=PI
?<I >@JAHTOONDD ! JHK<M@OD 9 : >>JM?DBOJ ODH
OC@RJM?NG3GX=X9ÍN@MÎ<I ? ?4H?4=49ÍNDB@MÎ C<Q@NDHDGMH@<I DDBN

> G3GX=X @THJGBD<GFÍNB@<I ? ÍNK@D<GHDOÔ B@I@MGFH@<I NÍRD<M?Î
> ?4H?4=4 ÍNDB@MÎ <GJ H@<I NÍ@>C<I O@MÎ<NOC@Q@M ?4H?44 9ÍOJ NDBÎ: <GJ
> H@<I NÍOJ ><NONK@GI Î ! JHK<M@OD 9 :

! JHK<M@ODM@JBI DU@ OC<OHTOOD>FI JRG@B@DNAPI ?<H@I@G
OJ $DI D>H<BD>

OC@RDH<M?DN<N@@M<I @K@M@D<G3GX=X OC@JI @RCJ FI JRN<GJAOC@ NKDMOD<I >@NJMNJAI <OPM@C@FI JRNOC@JMBDN FAGL JA@Q@MTOD B <I ? OODNDNOC@NJPM@JACDNKJR@M=@<PN@OC@H<G@>@IO@é><>TJA @Q@MTOD B<I ?JA@Q@MT=@DBDN=MJF@ <I ?DNJGNDADOH@@NJH@JI @ RCJ FI JRNDON@NN@>@DNJMBD DNOP@A<>@1J D JM?@MOJ C@G< RJPI ?><PN@ =T<I J=E@OH<?@=TDMJI OC@I JMH<GEHABF<M@I JO @JPBC OC@G3GX=XNCJPG?FI JR OC@NK@GG<M<ODB OC@- MBD JAOC@ 'MJI Î E4H74AFAGL OC@N@JMBDN<M@ËDDN@NTOJPI ?@M@<I ?RCTË KJ@OD> A<I GNDD>JMHTODD> 'I ODNR<T OC@H<BD>EHABDN<I <M<ODQ@ <I ?LPDD@NDHDGMOJ <I @KD>I <M<ODQ@RDC ROD>C DDN@NDGFJD@ ! JHK<M@DD 9 :

! JHK<M@DD<GJI JOD>@OC@KMN@>@JANTI >M@D>@GH@ONDOC@ DD><I GODJI NRC@M@LP@NDOJ OC@NKDMDJA<OPM@R@MAGR@=T KMT@MOJ (@NPN+ <MT 1O. @@MJMJOC@M<DDNOC<Ï@O@M@D OC@H 9D@OC@DD><I GODJI N?PMDB! <OCJG>OD@H@ND ! JHK<M@DD 9 : 5 DDC@@OI JBM<KOD>N@NDEDT &@PI ?@MH@NOC<OOC@ G3GX=XF?D?I JOKMJI JPI >@<I @ODM@NK@GD AMJI OJAN<CJG<MJMJ>JG G@OJMN=POOC<OD NO@?OC@T<GR<TNJH DONJH @RJM?JMD@OJ RDK@ JPOOC@H<BD<G@é><>T ! JHK<M@DD 9 :

OOC@=@BDI I DBJACDNHJI JBM<KC ! JHK<M@DD>JQ@M<I JOC@M A@OPM@JAMPI JNJI BN

OC@M@DNJI GFJI @H@M@AJM<GJAOC@NJI BNJA@Q@MTFD? @KD>H<BD<G JMGNM<GOC@M@DNJI GFJI @N@JAMPG@NJA>JHKJNDDJI AJM<GJAOC@H <I ?D @Q@MTJI @OC@M@DN<NDBPGMCJHJB@ @DTD OC@OJI @<I ?NDTG@ ! JHK<M@DD 9 :

2ODNH@ND>CJHJB@ @DT>M@C@N<NKJI G<I @JPND @M@SOP<GDT =@R@@?DAM@OB@M@N

2C@NDB@MOC@4H!4 M@K@ON<I ?>M@C@N<OOC@N<H@DH@C@A@@NOC<O OC@=PGFJANJI BNOC<OC@C<ND ODNHD?<M@ODNJRI <I ?JA@Q@MJI @ ODNDNODNFI JRG@B@NK@DH@ NP=E@O<I ?<GJ ODN?@D>@AJMODN KJ@D>RJMF &@D @MR@Q@NQ@M@NAMH GND>NJI BNRDC Q@M@NJA<I @KD>JMJA<I D><I GODJI <I ?C@DN<=G@OJ?J OC@JKKJND@<NR@GC@ KMJ>@@NAM@@T<NAJM?DA@M@OJ>><NDJI NC@PN@NOC@RJM?NN@@O@>@N <I ?AJMHPGNJA<G<I BP<B@OC<ODNOC@>JHHJI KMJKM@@TJA@Q@MJI @ <I ?PI ?@M@J?=T@Q@MJI @$JMNJ 9 : BM@ODNOC@I PH=@MJAOC@ Q<MDI ONJAOC@N<H@NJI B OC<O>C<I B@I JOJI GFAMJH JI @NDB@MOJ <I JOC@M=PO@Q@ RDOD OC@M@K@MDD@JA<NDBGNDB@MRCJI @Q@M NDBNOC@N<H@NJI BD OC@N<H@R<T 9 : * • I I MJOC<N?JI @OC@N<H@

RJMF<NOC@Q@M<>PG<MND B@MË J=QDJPNGD BM@C@MKMKJMDDI N AJM CDN" 4?8 4?4 C@EJD @ <GOC@B@M@NJAKJKPG<MKJ@MT AMH OC@ HTODD>NJI BNOJ KMQ@4N ! JHK<M@DD 9 : Ë

! JHK<M@DDé MHG>MDDDUD@ (<>J= %MDHH <NR@GG<NNJH @%@M H<I 0JH<I ODN<I ? N>CJG<MNJAOC@& JH @MD>LP@MDDI RCJ >JI ND?@M@OC@' 4?8 4?4OJ=@<I <I >DD@OI <ODDI <GKJ@HI F@KODD OC@Í=JNJH JAOC@K@KG@Ê & @R<N>JI QDD>@OC<OOC@KJ@HI R<NOC@>M<ODDI JA * •I I MJORCJ C<? D<Q@MTDD?DQDD?P<GR<T ?@Q@GK@<>JH=D<ODQ@ OC@CI DLP@KM@N@ODD OC@NJI BOM?DDDI ! JHK<M@DD 9 : & @KMDDI@NOC@>MDDD<G<>PDDT JAOC@$DI I DDC N>CJG<M(PGHPN) MJCI Ë <I ? OC@KMJE@OJAOC@$DI I DDC * DQ@MKPM@1J>D@@TAJM< APHPM@?DDDI JA<GGOC@K@KD<I ? H<BD>AJGNJI BN

AO@MOC@KP=GD<ODDI JAODNHJI JBM<KC ! JHK<M@DDM@H<ID @ Q@MT<OO<>C@OJ $DI G<I ? 2C@ODDOJM@I * DDD #GDN=@OC) <MOPHI @ QDDDQ?OC@N>CJG<MDI $GM@>@<I ?K<MDDDK<O@?DI ODNAPHI @M<GD 'I C@MI JO@N) <MOPHI @ H@ODDI @OC<OI JHK<M@DDDG<G@ JAO@ JA ODNDM<Q@@DDI $DI G<I ?<I ?ODNAMD@?N(PGHPN<I ?) <<M@) MJCI PBPNO OGLQDD<I ?#@HDG@MJML@@G N@@ @I I < Ë . <GNPJ Ë & @R<NQ@MTC<KKT<=JPO$DI I DDCDI ?@K@?@>@<I ? AJMOC@BM@@DDBNC@M<@QD@ AMJH $DI G<I ? AJMODNI D@@Q@C<I I D Q@M@HMT 2C@CTKJOC@NDDOC<OOC@M@R<NNC<H<I DDDD>DêP@>@JI OC@ H<BD><G<NK@ONJAMPI JNJI BNROD>CC<N=@@NPKKJM@?DI ?DAA@M@O R<TN=T! JHK<M@DD<I ?Q<MDPN$DI I DDCN>CJG<MNDDNDDG<I J=E@OJA GQ@G N>D@ODé>?DN>PNNDDI N<I ? >MDDDLP@NJ?<T N@@<GJ $MJB <I ? & TQ I @DI ODDNQJGH@ JOC(PC<. @ODDrDI @ <I ? I I < * @@<1DDF<G C<Q@ODBOGBOC@ OC@>JI ODD>PODDI JAA@M@=T ODDN G<GI N>CJG<MJ ODDN?@<<@ROD>CC<N<GR<TNOOMDG@ @K@MDN JA$DI I DDCAJGFGJM@

! JHK<M@DD<KKM@D<O@DI K<MDD>PG<M(PGHPN) MJCI ÎN* HB@4?4<A8A >E4? ?4HH78A; <FGE4 AF@@ BF4 " 4?8 4?4 9 2C@& DDJMTJA$DI I DDC* DQ@MKPM@. <MD - I @OC@' 4?8 4?4Î:

2 ODNKGI R<NM@BD@ <NOC@>JG@ODDI * HB@8A " 4AF4A - 4A; 4G) HABG 1) 40 9 I >D@OC 0 PI JNJI BNJAOC@$DI I DDC. @KG@

+;8) <G@Q<G 66BE7<A: :<AB B66;<

2C@éMD>JHKG@@OG<GI OM4I NGODJI JAOC@' 4?8I 4?4 R<NKP=GHDC@
D 5 C<ODNINPMKNMDIDB DNOC<OOC@OM4I NGOJMR<NI @DOC@M<
KODGGBDOI JM<RMD@M=PO<B@JGBDO<I ? K<G@JI OJGBDO'BDJ
! J>>OD Ë RCJ=@<H @DO@MNDO@ D $DIDC>POGPM@=T
>C<I >@'I <AO@MK<MDHK<ODBD <I DO@M<ODJI <GB@JGBT>JI
BM@NND 1<DO @@MH=PNB C@?@D?@OJ OM4Q@GD OC@dM4I ?" P>CTJA
$DGI ? <OOC<ODH@K<MOJAOC@ PNNBI #HKDM@ AO@MODNM@PM OJ
'<GG C@?@D?@OJ RMD@@=JJFJI $DGI ? <NC@R<NQ@MTDHKM@NN@
=TOC@>DQDBOT<I ? @P><ODJI JADNK@JKG@'I C@KP=GHDC@<O
ODNJRI @$K@N@#4 <A?4A7<4) <6BE7<8FGH7<9$DGI ? + @HIJMD@N
<I ? 1OP?D@Nî <I @@B<I OC<M?=JPI ? =JJFJA K<B@NKCJOJN<I ?
H<I TDGGPNMM4ODJI N N@@' <==MJN< Ë
OOC<ODH@'<GGR<N<TJPI BN<O@RDOCBM@OM@BJI <G>POGPM4G
<I ? NJ>DG?DK<MDD@N 2C@HD BPDOD>PI DOTJAOC@>JPI OMTR<NNOGG<
KMJE@OD é@MD >>JM?DBOJ! J>>ODOC@$DIDCK@JKG@>JPG?=@<
HJ?@GAJM<GBI N=@<PN@OC@T?D? NP>C<BJJ? E=JAJMB<I DUDB
OC@DMNJ>DGGA@D NKDO@JAN@Q@M@>GHI<OD>>JI ?DODJI N! J>>ODR<N
DHKM@NN@=TOC@ODBCG@OM4>TMO@<I ?GR>MDH@MO@D $DGI ? 'I
'<GG DGGO@M>TR<N<M@MDPNKMJ=@HI @NK@DG<GFD OC@>JPI OMND?@
<I ? >MDHID<GDOTR<N<NJ>DGKGBP@D N@Q@MGM@BJI N<I ?PM4<I NGPHN
'I OC@N@JI ? K<MOJAODN=JJF! J>>OD?@NH@NOC@?DKJNDODJI
JAOC@$DIN RCJH C@A@GC<?Ï<KOG@BH<OD<I ? ><GHI O@HK@M4
H@O=POQ@MT?@@NHD @ OJ OC@KJDOJAJ=NDD<>TNJOC@T=@<H@
@NDGDMD<=G@<I ?OC@T<M@Q@MTBDA@?D OC@N@LP<GDD@NOC<OOC@ I
>D@OO JH< 0@KP=GD>M@JHH@?@AJMTJPOC <N1<GGPNOJG?PN
M@NDGI >@OJ >JG?<I ?CJOR@OC@M@SOM@HI@@?PM4I >@D NDP<ODJI N
JANGM@ODJI <I ?AODBP@D! J>>OD 'I ODNQ@R OC@$DIDN
ÏNOMI BAJMGGFD?NJARJMF PI NPMK<NN@ =TJOC@M, JM?D>K@JKG@
C@DN<QGP<=G@KPM4C<N@<N<I DHHDBM4I OJMH<MD@MAJM<I TFD?JA
>JPI OMFD<5<7 $JMOC@N@M@NJI N C@MDM@NN@D ODNDOMJ?P>ODJI

DODNM@NJI <=G@OJ =@@Q@OC<OJPMBJJ? K@JKG@>JPG? GF@<?Q<I GB@
=TOC@@$<HKG@JAOC@N@K@JKG@RCJ éBCO<B<DNDOC@C<MO I @NNJA
NP>C<AM@@DB>GHI<O@<I ? RCJ C<Q@<I @SOM@H@GNDM@G<GI ? 9RCJ
<M@KMJ?P>ONJA>GHI<OD>>JI ?DODJI N@Q@ HJM@N@Q@M@=POAJM>DQDBOT
<I ?QDBJPMJAHD?<M@ JODAM@MJ JOC@MK@JKG@N! J>>OD 4

! J>>ODR<N>JI QD>@ OC<OOC@G<GBI NC<?H<I TOODBNOJ G@<M AMH OC@$DI N & @ODBOGBOONOC<O>DQDDHOODI NJI GKMBMN=T G@<MIDBAMH @<CJOC@M<I ?C@?@D<O@OC@=JJFOJ=JOCOC@JPI OMN@NÏ+ <TOODNKMQD?@<R<TAJMOC@N@ORJ K@KG@OJ M@<C<M@DK M><GFI JRG@?B@JAJI @<I JOC@M<I ? =@JHDB <>LP<IDO@? OC<O OC@TRDG=@<=G@OJ <KKM@D<O@<I ?GJQ@@<CJOC@MD 4

& @M@H @H=@M@RDOCAJI ?I @NNOC@$DI DOCCJNKDO<GDOT

GNODD <>JPI OMT=DBB@MOC<I 'G<GF RDOC NK<M@KJKPG<ODI ' <GR<TN AJPI ?C@<MOTM@<KODI N<O@@OD@>JI ND?@<MODI N9 :- A>JPMN@>G@<MGF GJF@ GF@<AJMDB I @M=POODR<N D>@AJMH @OJ J=N@M@CJR R@>JPG? PI ?@MN@I ? @<C JOC@MRDOCJPONK@<FDB OC@N<H@GI BP<B@=PO I @Q@MOC@G@NOGKMDNDBNJH@ODB Q@T?@KÐ ! J>>OD '''

AOMODNOM@N! J>>OD?@D?@ OJ G@<M $DI DOC & @R<N<H<I JA<>@MDD <B@=POC@R<NI @Q@MOC@G@NK=G@OJ G@<MI DOLPDD@R@G C<QDDBOMI NGO@<NI @G@MDD@<GJA0 PI J JAOC@ 4?4I 4?4<I ?K<MOD JA0 PI JN AMH OD@ãåâOJOC@@? <I ? AMH OC@=@BDI DBOJ OD@âåß 2C@KP=GDC@MR<NJDHKMDNM@OC<OC@DNGMM@OC@OMI N GODI NDOC@@?JA# 4 <A?4A7<4<I ?KMJKJN@OC<O J>>ODOMI NGO@ OC@RCJG@KD> ! J>>OD?@NHD=@OODND <G@OOMNOOJ # , 1@DG <I ? NP=N@P@OGKP=GDC@ D $DI DOCD OC@NHD@OO>H<B<UD@ 4<GQJE<

5 C@' =@B<I HTOM@@OMPBC$DGI ?<I ?'N<R OC<OAJM<B@JGBDOD GF@H@OC@M@R<NI JOHP>COJ?JJI HT@>PMDI ' OMD@OJ J=N@MQ@ <I ??@NHD=@JPM=@POAPG>JPI OMTAMH <I JOC@MKJDOJAQOR 5 C@ ' éI <GGF?@D?@OJ KP=GDCOC@ JONJI HTOM@@AN<=JJF <NR@<M@ <>>PNOJH@OJ ?JD 'G<GF ' M<GD@OC<ODR<NM<GGFI @<@N<MOJ G@<MI NJH@$DI DC ' DO@MKO@HTRMDDBAJM<RCDG@JM?M@OC@ @<@N N<MT=JJFN<I ?NGM@OJ G@<MI OC<OGI BP<B@NJ ?DAAMOAMH HD@ N<I @@MDD@ =@B<I OMI NGODBNJH@D@NJAOC@ 4?4I 4?4 HTKP= GDC@MC<QDDBM@?OC@OMI NGODI N?@D?@OJ <??OC@H<I N<I <KK@?DS <OOC@@?JAHT=JJF I ?NJ C@?D? <??DBOC@JMBDD<GJ@OJ OC@ OMI NGO@JI @ AOMOODN@<HKG@JAOMI NGODI ' R<NDQDD@OJ OMI NGO@OC@RCJG@ 4?4I 4?4 'I OC@éMOHJH@O' MNDD@HTRJMF OJ <N@@ODI JANJI BNOC@N<H@OC<O+ DOD2<GBM@KP=GDC@D 4<G QJE< 'I OC<O@@MDD@ OMD@OJ <?<KOOC@N@M@@@K<MODNAMH" 4?4I 4?4 DOJ OC@G<GBI GI BP<B@OJH<F@OC@H HJM<>>@ND=G@AJMJPMG<GBI M@?@N' OMD@OJ KMKK<MOOC@M@?@NOJ @EJTOC@M@DG<GJA<I @KD>KJ@H + TBJ<GR<NJOOJDOM?P>@OC@M@?@NOJ OC@MDP?TJATJPMG<GBI BP<B@ 'I OC@HD??G@ >JI ODP@HTNDP?T=POOC@M@MOR@JA<>OMOC<O?DN

> OM@NH@$DMOG OC@A>OJAG@MID BOC@GI BP<B@ONP>C<I <?QI >@
> <B@N@JI ?GOC<O<GGOC<ONH<GGOK@A>@NOC<OéGGPKTJPM?DOJI <MD@N
> <I ? BMHH<MC<Q@?<H<B@ HTNBCO ROC>C<OOC@HJH@ODND
> >M@D=GR@F I ?DODN@@ RJM@RC@ TJPMH@HJMTM@PN@NJ N<Q@
> RC<OTJP<M@@MID B - I GJI @OOD B?J@NI JO<=<O@HTNOP=JM
> I @NN'I HT=JJF 'C<Q@OM@ OJ KM@N@OOC@DHKM@NDJI NOC<O$DGI ?
> <MPN@D H@ RJPG?@F@OJ >JH@=<F OJN@@B<D <GGOC@OGPNOMJPN
> AM@?N H@O'C<Q@>JQ@M@ <GJ OC@ 4?8 4?4 =POODRDG=@M@PI ?<I O
> OJ G<GI JR<=JPOOD<I ?R@>JPG?KJNKJI @OC<OAJMOC@I @$OOH@
>
> M@JJ ©JA" @@HI=@M
> 'BDJ! J>>OD

! J>>OD<??M@N@ OC@ 4?8 4?4 D N@Q@MGK<B@NJAODN=JJF<I ?D K<MODPGMD OC@ C<KO@MI Ï#KJK@@KJ@NDGHMD<D9Í#KD<I ?* TMD> . J@MÎ: Ï'GKJ@HI<D9Í2 C@ J@HÎ: Ï1PI OJ ?@G 4?8 4?4D9Í1PH H<MTJAOC@ 4?8 4?4: Ï I >JM<?@GKJ@HI<D9Í- I >@+ JM@JI OC@ . J@HÎ: Ï- =D@JJI D@?<G<D9Í- =E@ODJI N<I ?" <ODBÎ: Ï'éG GBDD9Í2 C@ ODGGBDMDÎ & @ JOD@ OC<ODD) <M@G* • I I MJOC<? H@O<A<HJPNMPI JNDB@M<=G@OJ EDD N@Q@MG@KD>NJI BND JM?@MÏOJ AJMH <PI Dé@KGJO<I ?<K<MOJA<KJ@HID ! J>>OD

2 C@JKDDJI NJA! J>>OD<I ?! JHK<M@DD<M@D H<I T M@NK@ON JKKJND@! J>>ODR<N>JI QDD >@OC<OOC@KD>R<N=JMI ÏD OC@=JNJH JAOC@K@JKG@D<I ?OC<O* • I I MJOPNDBOC@N<H@H@OCJ?<NOC@NDB@M AJM<GNB@MN@@ODJI JANJI BNÏR<N<=G@OJ ?DN>JQ@MOC@>JI I @ODJI N <I ?JM?@M=@R@ OC@éAOTNJI BNJAOC@KD>KJ@HD & @ ?D?I JOM@GG>JI ND?@MOC@" 4?8 4?4 OJ =@< G@DM@MT O@S@O=<N@ JI AJGGJM@=PO<N<M@GN@NODJI <GÏ?DN>JQ@MDJA<AJG @KD><I ?OC<O * • I I MJOR<N<I @RÏ4B7eD9! GNND<G%M@FÍ@KD>NDB@MÎ Ï2 C@%@M H<I NRDOCOC@MJKDDJI JI OC@&JH@MD>KJ@HINAJPI ?I @R<MBP H@OJNJI AQJPMJAOC@MOC@NDN<I ?C<DG@* • I I MJO<N<I @R&JH@M OC@&JH@MJAOC@ JMOD

! J>>ODJHK<M@NOC@<>ODQ@HI @OJAOC@OC@AOJAOC@4@CBRDOC OC@OC@AOJA <G?DPH =JOCOC@J=E@ONBP<MI O@OC@C<KKD @NN<I ? NP>>@NNAJMOC@K@JKG@OC<OJ=GDD OC@HI ! J>>OD 2 C@

2 C@@@MR<NKP=GDC@ D $DI DCJI Ï4<GQJE<DI 2 ODN#I BGDC OMI NGODJI =T4 @N+ <O@J . DG?P DNAMH OC@ GGI OMI NGODJI JAOC@@@M=T0 J=@MJ " <==MJN< 1@@" <==MJN< KK

2 C@ <G?DPH JM <G?DJI R<N>PGJ=E@OJI ROD>C OC@N<A@TJA2 MJT <I ?0 JH@R<NND?OJ ?@K@? OC@RJJ?@ NGOP@JA <GN OC@<OC<O ?TN@N

<OO@HKONOJ H<MT OC@' <PBCOO@MJA. JCEJG MGHID ? CDH JAOC@
<=?P>ODI JA& @@@ =T. <MDN<I ? OC@2 MEI N<I ? JAOC@<=?P>ODI JA
OC@1<=D @RJH @ =T0 JH PGPN<I ? OC@0 JH <I N & @<GJ KMJKJN@
<CDDJMD<GD O@KM@<ODI JAOC@KD>OC<ODLPD@@OC@JKKJNDO@JAOC@
I JI ODDJMD<GD O@KM@<ODI JA I JH K<M@ODÏ 2 C@' 4?8 I 4?4 DN<I <M
M<ODI JA R<M<I ? =<OOGN<I ? OC@OM>JI N@LP@>@NIOC@éI <G?@A@OJA
OC@' <KKN<I ? OC@>JI LP@NOJAOC@>JPI OM=TOC@$DI N! J>>CD

2 C@KM=@HI RDOCOODNFD ? JA R<M<I ? I JO@<NORDOCOC@?DN
K@MDI Î JAOC@' <KKN DNOC<ODDDN JOM@<O@ <O<GD OC@KD>KJ@H
* • I I MJOR<NCDHN@A>JI QD >@OC<OOC@KD>NJI BNM@KM@N@ O@ OC@
ÍKM@DDJMÎ JAOC@$DI N<I ? RMJO@<=JPO<=<OO@=@@R@@ ORJ $DI D>
@@I D>BMJPKNI JOJA<$DI I D> * <KK>JI êDO! J>>CDDNAJM@OJ <?HDO
OC<OOC@ <G@@G<?J@N JOKM@N@Ö<?@N<MDKODI JA& JH @MD=<OOG@NOD
<I ? OC<OOC@ <M<ODI JA ODNCTKJOC@DD<G<I >@NDM<GR<MÏDNJA@ @$
KM@N@ D HTOOD<GR<TN<I ? DN<GR<TNODBOGKJ@DD ! J>>CD

& @EPNDÉ@NODNOC@JMT =T <NN@MDD B OC<OOC@$DI D> H DDOM
<?Q<I >@DHKMJQ@OCMJPBCÏNGR<I ? KMJBM@NNDO@DQ<NDI ND <5<7
& @>JI N?@M@OC@AMJP@>TJAOPI OD B@KDJ?@NJ =@<H@HJMTJA
JOC@MODDJMD<G@@@ONOC@N@?@HJI NDMO@OC<O$DI NÏNCJPG?>G@I
PKOC@M@BDI AMJH <GJOJA=@<NDD ! J>>CD

! J>>CDDNHJM@JI OC@N<H@R<Q@@BOCRDOC! JHK<M@ODRC@
C@N@<O@NOC<OÏNC<H<I DNHDNKM@N@ONOC@?JHD<I OM@@BJPNAJMHD
D OC@' 4?8 I 4?4 & @>JI OD P@N=TNG@DBOC<OÏ3 I ODG<GOC@
@N<I OC@ OMDNDI ADDCJAOC@$DI NR<NKJGGPO@=TNC<H<I D>KM<>
OD>@ND & JR@@MC@DN JO<=<G@J NF@OC<HJM@>JHKG@$
CTKJOC@NDN<=JPOOC@ODDJMD<G?@Q@GKH@OJAOC@MC<H<I D>JI BN
D NPI JNJI BNJM$DI I D>NK@GN<ND OC@<O@HKO=T! JHK<M@DD- I
OC@JOC@MC<I ? DODNDO@M@NDDBOJ J=N@Q@OC<O J>>CDI JOD@NOC@
DHKJM@I >@JAOC@' 4?8 I 4?4 <I ? OC@NPI JNJI BNAJM$DI I DNC<MDN<I ?
D K<MDD>PG<MAJMOC@OC@OMC@RJPG?ODF@OJ N@@I ' GGBI OM<I NGODI
JA$DI I DNC?M<H<N & @ODBOGBOONOC@<=NJGPO@DHKJMD
<I >@JAHPND<I ??@D<O@N! C<KO@M OJOC<OJKD> & @N@ONDC<O

<I ? " DJH@@NDJG@AMJH 2 MJT<I ? ROD>C R<NG@M@<F@ OJ OC@ @<M=TAPOPM@
NDO@JA0 JH@=T @<N 2 C@0 JH<I Q@MDI DNM@<O@ D OC@ 8A87 JA4 DMBG
! J>>CDDNI JOQ@MT <>PM<O@ OC@$DI I DNC C@M@NI @Q@M<=?P>O@ OC@
" <PBCOO@MJA. JCEJG RCJ R<NH<M@@ =T' GH<MD@ <AO@MOC@AJMBDB JAOC@
N<HKJ AJMC@MHJOC@MOC@+ DDM@NJA. JCEJG

DD OC@<N@JAMPI JNJI BNÏOC@KJ@OMTDDKGR<TNH PND<I ?ND B@MDNOC@
KJ@O OC@<MOJANDD BDD B DNI JO?DNJII @O@ AMJH OC@KJ@OD AJMHÐ
2C@<MOJANDD BDD BR<N<GJ M@@Q<I OAJMOC@I @R B@I @M
<ODJI K<NNDJI <O@AJM>CJM<GH PND>

NDD BDD BRDOCNKJI G<I @PNA@@DBNRDOC<K@MA@OC<M<I JI TJAQJD>@N<I ?
MCTOOH DNOTKD<GJAOC@B@I DPNJAOC<CK@JKG@9 :2C@KP=GD>DNHJQ@
<OMMGNKM@?N<I ? OC@A@@DB JAOC@K@AJMH@MNHJQ@NOOMPBC OC@
GDO@ @MN<I ?êJRNAMJH JI @@?OJ OC@JOC@M ! J>>OD Ë

! J>>ODR<NNDD >@M@GDHKM@NN@=TOC@PI DQ@MNDOTNDP?@O>CJDMD
1@<O@1LP<M@DD & @@NDFDÏJI + <T" <T <GGQJD>@NRDOCJPODD NDMP
H@ON<I ? OC@M@<M@OCJPN<I ?NJAOC@HI Ð & @<GJ J=
N@MQ@OC<OOC@Ï>JI >@MRDOCNDMD B@?DD NDMPH@ODDDÏK@MA@OF@S
@PO@?D<I ?C@AJPI ?OC<OOC@M@DN<>JI OD PDOT=@R@@ OC@<=DDDOTD
KGTDD B NDMD BNÏDD BM@ODD NDMPH@O<G>JH KJNDDDJI Ð<I ? OC@H<BD>
JAOC@4AG88 OC@DM?DDDJI <GC<NK GHF@DD NDMPH@OJA4rDrH•DD@

B@8A<6B <V@CB?<F AGB7H6G<BA GB :<AB B66;<F+E4AF?4
G<BA B9G;8) <G@Q<G

2C@éMNK<MDGDMI NGODJI JAOC@ 4?8 4?4 =T! J>>ODR<NKP=GDC@
DD <I ?DD>G?@OC@H<O@NGKP=GDC@JI ODNKM@QJPN=JJFJI
$DDG<I ? <GJI B RDOC N@Q@O@@ JOC@M0 PI JN & DN>JHKG@@OMI N
GODJI R<NKP=GDC@DD " @ I I <KJDD ONJPOOC<O

OC@LP<GDTJAOC@OMI NGODJI C<N=@@ KM<DN@ @Q@ DAOC@M@DN<>@MGD
H<I DKPGODJI JAOC@JNBDD<GO@SO=@<PN@C@F@NN<R<C>CAPG@T@JI
OC@$DD I DC JNBDD<G=POODNRJNF R<NH<DDG=<N@ JI OC@Q@NDJI
JA* vJPUJI * @' P> " @ I I <

2C@DDOM?P>ODJI OJ OC@OMI NGODJI R<N=TOC@RNDO@M1GQD>DO
<I ?GD=MNDI " JH@DDJ! DH KJG Ë 2ODNDDOM?P>ODJI
DNK<MODPGMF DD O@M@ND B =@<PN@DOM@@NOJ OC@?DÉ>PGD@NOC<O
! J>>ODC<?DD éI ?DD B<KJ@DDH @MAJMOC@OMI NGODJI 'ODNGJ Q@T
>MDDD<G<I ?LPDO@NPNKNDDDBAJM<I DDOM?P>ODJI ! DHKJGM@JPI ON
OC<O! J>>ODNM@OJOMI NGOC@C@éQ@PI JN?@D<O@OJ) PG@NQJDD
<I J>OJNTG=D>H @M@! DHKJGKM@@M@ OODéMONJGPODJI

=POOO@HJI JOJI T JAOO@>JI OD PJPN?DKJ?D@NRJMWD@ ! J>>OD O@ OOJPBOOOO<OI 'G@GI J=OB@ OJ M@? éAOT0 PI JND OODJ>OJNTG=D> H@OM@HDBOOBJ>MUT<I ? MDM@PK<B<DNDOO@OMI NBOJMI ? OO@KJ@H O@OOJPBOOOO<OI JO@JPBOK@KG@HJR OO@JMBD<GOSOR@G@JPBO OJ PI ?@M@I ? NP>O < >OJD@<I ? JI G OOJM@A@R ROJ R@M@SK@MN RJPG'KM@@MO@GI BJ>OJNTG=D>G@I D@NÑ: 2O@NP>>@NMPGSK@MD H@ORDOOO@NJI BNJA) PG@MJ ROD>O' KM@@MR<N JOBJJ?@JPBO OJ >JI OD >@ODH O@R<N?MDQ@ =TJPMD@MTOM?DODJI =TOO@?<KO <=DBOT JA< GI B <I ? NDHK@H@M@=TOO@?@NDM@OJ =@OJG@M=G@OJ M@?@MI ? éI <GT=TOO@H<NODMTOO<OO@A@GO@O<? <I ? O@JKO@AJM OO@O@?@<NTG=G@ ! DHKJGD 64'Ë64''

! DHKJGDH@ODI NOO<OI J>>ODR<NDNKDM@=TOO@AHJPN G< G@I OMI NBODI NJA& JH@M=T4D >@UJ + JI OD<I ? 1>DKDJI @+ <A@D G@OJPBOO@Q<GP@OO@PN@JAOO@O@?@<NTG=D>H@OM@D Q@MI <>P G<MG<G@I KJ@MT ! DHKJGDM@HI <D @ N>@KOD<GJADDNPN@O@M@

' ?D?I JO<>>@KO@DORDOOKG@NPM@<GJ =@<PN@OO@Q<MDPN@SK@MD H@ONRDOOOO@J>OJNTG=D>H@M@OO<OI O<? <GJ <OO@HKO@AJMHT Q@MDI JA0 PI JN <I ? B<Q@<M@N@JAGI BDB I JQ@GT<I ? I J=DBOT OJ @<O JAOO@NJI BN OO@TO@G<I @SJOD<I ? M@HJO@<PM<OO<OOO@ M@?@M>JPG'=M@OO M@?DB OO@OSO "4?8 4?4 D O@?@<NTG=D> Q@MK@NDD >JI OM<NDOG=@<$DIDOOMI NBODI JAOO@?47D DNJ>OJ NTG=D>H@M@ ! DHKJGD 64''

& @?J@NJAA@MNJH@>JHH@?<ODI N

' RJPG'OG=@OJ J=M@MQ@OO@SOM@HI@A<OBP@D PNDBOO<OGD?JAH@M@ 9D@OO@O@?@<NTG=G@ RDOOJPO=@PH=DB OO@M@?@M'I ?@@ ! J>>ODD H<I TQ@M@NO<? J=G<D@ I <MAOOQ@S>@G@>@RDOOJPO<I T ?@MDH@OOJ OO@OBD@MGN@N@ ! DHKJGD 64''

! DHKJGDPI ?@M@I ?NOO<OOO@<OJD@JAI J>>ODRJNJH@DH@N ÏR<GNND?@=TND?@RDOOOO@JMBD<GOSONJH@DH@NAJGRN=@OD? DD<I ? <ODH@N?MAN<K<MOAMJH DDI<I ? ÏH<?@ODH@N@ANJH@RO<OJA <I <POOJMDÏDNI JO<KM=G@HAJMOO@HPGDDP?@JAOO@M@?@MD=PO JI GAJMÏPNOO@KPI >OGJPNJI @D 64'' ËD@JI GAJM<OJGMN DO@G@PKG<GI ? OO@@P?D@! DHKJGI @Q@MOO@@NND@? OJ @?JI <?DKGH<ODI JO@ÏJPMéMKDJI @@MOJPG'=@KMDM@ RDOOJPO<I T M@M@Q@AJMODNJPMB@BJJ?GN@I ? K@M@Q@M >@D ! DHKJGD 6'6 I ?éI <GTOO@M@DKJGDD<G??M@N

NC<?C<KK@@@D JOC@M>JPI OMD@NJA#PMJK@OC@OG<GH NKM@ JR<=G@ OJ M@?D OC@DMJRI G<I BP<B@OC@RCJG@H<BI Dé>@OKJ@H JAOC@N@ $DI N RCJN@I <ODJI <GGA@DNNJ PI EPNOG<I ? N<?G OMM@OC@@ <I ? 'G<GH N><I D>M@N@OC@DMNTHK<OCT<I ?<AA@ODJI AJMOODNK@JKG@OC<O I JR DNNPAA@MD B <NOC@T C<? NPAA@M@ OODNDN< BJJ? B@OG@C<M? RJMFDB<I ?R@GGM@?K@JKG@<I ?DDNJI G<NKDMODJI DNOJ GDQ@AM@@D DDN?M@HTJG'OM?DDJI <I ?OJ =@<=G@OJ NDB DD<B<D AJMOC@DMAPOPM@ B@@MODJI N ! DHKJGD 66

ND?@AMJH OC@>JHK<MDNJI =@OR@@ OC@ÏNPAA@MDBEJA$DI ND OC@K@MDJ?JA0PNND é><ODJI <I ?JAOC@OG<GH N=@AJM@OC@PI Dé><ODJI OC@DOM?P>ODJI >GNM@RDOC<Q@MTJK@?@GMODJI D A<QJPMJA$D IDCD?@K@?@>@! DHKJGDN<GJ <=DOKMQJ><ODQ@JI OODNOJKD> RDOCOC@DMI NGOJM=@<PN@ J>>ODGJQ@$DGI ? =POC@R<N>JI QD>@OC<G<$DI DCD?@K@?@ONGO@RJPG'AJMH OJR@F<I <ODJI

+;8+E4AF?4GBA<A&6GHL?45<6$ 8GE85L' 4B?B @<?B' 4IB?A<

2C@KODGGBDDG<I ?GH BPDDO <JG#HDGJ. <QJGHD Ë R<N
.MJA@NNJMJA1<I NFMDAMJH <I ? <OOC@3IDQ@MDOTJA$G
M@>@<I ?JI @JAOC@HJND<>ODQ@OMI NGOJMNJAODNODH@&@RMJO@OC@
@NKT H77<F@B9Í P??ODNHÎ: <I ?OMI NGO@ E8FGB@4M478?
)I@IL4¨4 9Í2C@ IOCJGBTJA0‡H‡T<È<Î: $ 4;I5;IE4G4
G<FB7<F68?G9Í+ <C‡=C‡MG< 1@@@ODJI NJA#KDNJ?@Nî $ <?8
F8AG8AM8<A7<4A89Í 2CJPN<I ?'I ?D<I KCJMDHNî <I ?H<I T
JOC@MOC@ON<I ?KJ@HINAMJH#NOJI D<I . JGDC G=<I D<I <I ?+ J?@M
%M@@F 'I C@KP=GDC@<I D OC@M@ND B<MDG@JI OC@#NOJI D<I
@KD>)<G@QDKJ@B =T 4D?ND 0JDD 0DMDH@N 9$ND@NDC
0@DCJG') M@POR<G: Ë OODNKMDG@JI GDNNJH@OMI N
GODJI N<I ?<>JHK<MDNJI =@OR@@ OC@>M@ODQ@KMJ>@NN=@OJI ?OC@
>JHKJNDDJI NJAOC@ 4?8I 4?4<I ?" 4?8I <GB8:

5 C@M@N*•IIMJONM@R@ OJB@OC@MKPOC@OD><I ?<QDG=G@AJGFNJI BN D OC@H@ND<GAJMH JAOC@EHAB OC@H<O@MDGJA) M@POR<G? R@M@D OC@éMKG>@KMJN@<MAODQ@NRODCC@OM@?OJ Q@MATD OC@<ODJI <G H@M@<OO@HKOD BOJ=@GT<GJ OC@JNBDD<G?DOOJI 5 @NF@<GPG<O@ OC<O Q@M@NKM@M@KMJ?P>@D OC@NH@AJMH <NOC@JNBDD<GAJG NJI BN=POOC@>JHKG@@@ PH=@MJAQ@M@ND " 4?8I <GB8: DNJH@ GH@N'ODNKJNND=G@AJMNCJGMJOJ >NDD<GF<NM@NJI GFK<MOJADD . < QJGHD Ë

. <QJGH DR<N<I I JT@ =TOC@A<>OOC<O) M@POR<G? =PMI@ OC@ JMBD <GH<O@MG<I ?KM<DI@* •I I MO<AJM<QD B>JI N@Q@ D<I ?AJM BDQD BDOOJ OC@$DI DC* D@R<OPM@J>D@OT

'I . <QJGH DNG<M@ ODNO<I NG<ODI JA" 4?8 4?4 & DNJ=E@ODQ@ R<NOC@N<H@<NOC<OJA! J>>OD DDR<N<I @G@<HD@OJ DHKMQ@ODN $DI DC G<I BP<B@NFDG<N'I C@@G<AOAJM$DI G<I ?<I ?. MJA@NNJM # @HDG; @NJML@ @G Ë JI @OC@HJNOM@G@<I O@K@NDOJA $DI DC G<I BP<B@<I ?AJGF KJ@OMT R<NODNBPD?@2 C@T><H@J OC@ QG<B@JA d DHr E MQDD JM?@N) <M@G< RC@N@ <QJGH DC<? J>><NDJI OJ GDNO@ OJ MPI JNJI BNJI +;8 84FGB9' B;=B?4 +;8. BE?7 EB4G<BA +;8 EB4G&4> +;8*<A:<A: B@C8C<<BA<I ?+;8 84G;B9 ;E<F<A?HH OC@ @BKNJA OC@ NPI JND B@MD@<I <&rMF•I @ " PMD B ODNOM<Q@G@N C@ =@<H@ AMD@?NRDOC. MJA@NNJM) <<M@G) MO<I Ë OC@NJI JA(POBPN) MO<I <I ?JI @JAOC@H<D <POCJMDOD@NJI $DI DC AJGF KJ@OMT 'I ODN<MOD<G@ A4I 4E<4A<8?78?" <?4?4H?4A<4° 9́ 4<M<I OJA +;8*<A:<A: B@C8C<<BA<Î: . <QJGH DOM<I NG<O@JI @Q@MT DI JA OODNNJI B KP=GDNC@ =T) MO<I D ODN" 4?8 4?4A EHAB8A;<FGBE<4 9́ & DNJMTJA OC@ PI JNJI BNJA OC@ 4?8 4?4Î: Ë Ë

JOC 1@ @G OC<I) MO<I D DQ@@ . <QJGH DOJ >JI ODNP@ODNOM<I N G<ODI JA" 4?8 4?4 RCD>C OC@ G<G<I N<CJG<MI DDD<GF=@B<I D KMJN@ AO@MODNOM<Q@G. <QJGH DI JOD>@ CJR @<NDGF C@ OM<I NG<O@ OC@ @H @N DOJ OC@J>OJNOG<=D>H @M@ <I ?>JHK@G@ OC@RCJG@OM<I NG<ODI D

'OR<N KP=GDNC@ D OC@KM@NODBDJPN=JJFN@MD@N* <=D>GJO@<?@D . JKJGD9́2 C@* D=M<MT JA. @JK@N Î: @D@ =T OC@ A<HJPNKJ@O<I ? RMD@M%DQ<I D. <N>JGD Ë =T OC@ KP=GDNC DB>JHK<I T 0 @HJ 1<I ?MJI D JI @T@<M<AO@MOC@OM<I NG<ODI =T! J>>OD" @ I I < J=N@M@N OC<Ï OC@OM<I NG<ODI =T. <QJGH DR<N<I ? M@H<D DN>JI ND?@M@ OC@=@NOJA OCJN@KP=GDNC@ D 'G<GD

2 C@ >MD DD DH NJA OC@ RJMF ?JI @=T. <QJGH D<M@JA@ >JI I @O@ OJ ODN>CJD>@JA OC@J>OJNOG<=D>H @M@ <H @M@ @Q@MPGF<>>@K O@ =T OC@G<G<I G@@M<MT @N<=GDNCH @O=TNJH @N>CJG<MN<I ?RMD@MN D DO DN>JI ND?@M@ ÍHJI JOJI JPNÎ JM@Q@ Í>ODBDNC Î 2 C<OR<N OC@KMD >DK<G M@NJI RCT! J>>OD<=<I ?JI @ OC@OM<I NG<ODI D J>OJNOG<=D>Q@M@ KM<DN@ =T! DHKJGD- OC@MJ=E@ODI OJ . <QJGH DNOM<I NG<ODI C<N

'I 0 @ & @ . M@NNKP=GDNC@ OC@ÉMOM@G<ODI JAKJ@HN=T%DQ<I D . <N>JGDD # I BGDNC OM<I NG<ODI PI ?@M OC@ODOG@#4FG- BL4:8 *8?8C8?' B8@FB9 <B I 4AA<' 4FGB?<

=@@ ÏOC@M@@@@M@@PN@JAOC@MCTH@<=NJGPO@GN@JI?<MT<I?
D>D?@GGD OC@$DIDCJMBD<GD" @II< #Q@@NJ OC@
M@?DB JAOC@OMI NGODI =T. <QJHDDN@EJT<=G@OC<I FNOJ ODN
JKODI AJMOC@QDPK@M@?J>OJNTG=D>H@M@OC@OMI NGODI DNHP>C
HJM@GT<GJ OC@JMBD<GA>JHK<M@?J OC@C@?@<NTG=D>OMI N
GODI JA J>>OD >>JM?DB. MA@NJM <MI@+ 2<GBM@ Ë
OC@OMI NGODI =T. <QJHD DR<N<GNJI @JAOC@HJN@EJT<=G@

#Q@@ DAOC@OMI NGODI =T! J>>ODR<NM@NDOC@?NJJI D ÏDD
R<NOC@JI @JA <QJHDDD K<MDDPGMDC<O<>OD@Q@?NP>>@NN=@@DBM@
KNDO@?D <>JI NDOC@OGF<=ND?B@=PO@JI JHD<GQ@MDI =TOC@KP=
GDODDBCJPN@<I NJI DD <I ? ÐN@@ @II<
0 @@OGFOC@>JHKG@@OMI NGODI =T. <QJHDDC<N=@@ MKNDO@?=T
OC@KP=GDODDB>JHK<I T'G @M@OJ <I ? DD><I <GNJ =@M@?JI OC@
DAMNOR@ND@@

. <QJHDD?@D<OC@?ODNOMI NGODI OJ! JHK<M@DD<I ?D OC@DOM
?P>ODI OJ OC@ @DDDI C@?@A@?ODN>CJD>@AJMOC@J>OJNTG=D>
H@M@

2C@JG'J=E@ODI OJ OC@HJI JOJI TB@@M@@=TOC@PN@JAOODNH@M@
D GI B>JHKJNDDI NC<NDJPM<N@<Q@MTM@@D@R@BCOOC@OMI N
GOJMNRCJ C<Q@OM@@OJ <QJD?DDC<Q@HDS@OC@Q@MN@RDDCJSTOJI @N
ËI @Q@N@@DEHABKJ@MTËRDDCOC@K<MSTOJI @Q@MNJAOC@JMBD<G
EHABKJ@MT'RDGHJOGGF<=JPOJOC@NRCJ C<Q@OM@JOC@MH@MN
NP>C<NOC@?J?@<NTG=G@@?@<NDG=G@JM GS<I ?MD@RDDCMCTH@N
RDDCLPDD@>JHD<G@A@ONAJMNJH@I @RCJFI JRNOC@<GHJNDDAI ODG@
NDHKGDDTJAOC@JMBD<GMCTOCH . <QJHDD 64

2C@OMI NGOJMODBOBOONOC<OOC@PN@JAC@?@<NTG=D>Q@M@
?DDJMNÏ<GGOC@<OPN@JAOC@JMBD<GKJ@MT3NDBODDNH@M@DDD<G
OC@HJM@DHKJNDE=G@J F@KOC@RJHJNDM@@<I O>C<M>OMDDNJA
OC@EHAB<GDOMDDI <I ?K<MGGODH Ð. <QJHDD 64' &@J=
N@M@?OC<OOC@HJI JOJI TEJAOC@$DIDCJ>OJNTG=D>Q@MN@DD<M@
NPGJANDBDBOC@HRDDC<MK<ODBHPND<G<?@>@<I ?OC<OOC@
NCJMOQ@M@DNJA@PN@DAJGFKJ@MT<NDD1@@<I @KD>NJI BN<I ?
DOC@BBG 774 . <QJHDD 64'
3NDBJI GOC@J>OJNTG=D>H@M@. <QJHDDR<N=G@JH<IDGID
OC@K<MGGODH JAOC@JMBD<GQ@MN@N#Q@NJ C@<?HDD@?OC@?DAé

QGG=G@JI OC@DAMNOR@ND@3 0* COK =DAMNDD$', , ' $JI OD
) <@Q@G # COHG

>PGDD@ND H<DI GDI DI B <GDD@MODI =@<PN@DD OC@$DI I D>Q@N@NDO
>JPG? @Q@ <KK@MODM@JMAJPMDH @ND <NDBG@H @@B >HA><>HA
A4; 4A>H>H?8 'I 'G<GH DDDNLPD@?DAé>PGOJ OMI NGO@ROD@KM@
>DN@GH <DI GDI DI B OC@$DI I D><GDD@MODI =PO. <QJGH DH @ODI N<
K<DMJANP>>@NMPGO@<H KG@N

?< ; @4>F<EHC8F<

$PJ>J AJGG@?DAPMJM@9AMH 'G<GH Í$DM@APGJAAPMÎ:

" 4?8 4?4 0 PI J àà

F<‡B>F< BG4 @LB8A

>JM@DGPKJ GH BJ DG<BJ 9AMH 'G<GH ÍMPI OC@RJGA<MJPI ? OC@G<F@Î

" 4?8 4?4 0 PI J èè

5 DOCM@B<M?OJ OC@M@PI ?<I >TJAMCTH @NOC<OD 'G<GH >JPG? =@
>JI ND?@M@ ÍOJJ @NTÎ . <QJGH D?@A@?ODH N@AN<TDD B OC<OOC@N@<M@<
M@NPGJAMCTH @NOC<OD OC@NPI JNJI B<M@ JOM@GFQJGH GMT =PO<M@
<I PI <QJD?<=G@KMJ?P>OJA$DI I DDCNPAéS@N N@@ <QJGH D 64''
- OC@M?DAé>PGDD@N>JPG? =@OC@<=PI ?<I >@JA?DH D POD@NRDDCJPO
KM@DN@>JMW@NKJI ?@>@D 'G<GH @B 4HE<A>BA8A9ÍGDD@?@MNPI Î:
$JM<GJAOC@NOM@NJI N. <QJGH D<?H DO@? OC<OOC@HJNOGT<GMI N
G<ODI JAOC@ 4?8 4?4 R<NOC@& PI B<MBH JI @=T4 DFpM vG< $JMODN
RJMF . <QJGH D?@GM@ OC<OC@PN@ #DJ 1<F<MD7 NE) JNFD @ÎN
$DI DDCË$M@>C?DODI <MT<I ?#NDF#PMI ÎN$DI DDCË1R@DDC?D>
ODI <MT <I ? OC<OC@>JI NPG@? OC@%@NH<I OMI NG<ODI N=T $MI U
I QJI 1>OD@A @M <I ?& @NH<I I - 2C . <PG OC@$M@>C
OMI NG<ODI =T* vJPUJI G@ P> <I ? OC@1R@DDCOMI NG<ODI =T
) <MG JGGH Ë

0 @B<M?DI B ODND @NKM@<ODI NJAOC@>JI O@ONJAOC@KJ@HI N OC@
M@@ODI NJA <QJGH D<M@JH KG@@GF?DA@M@OAMH OCJN@JA' J>>OD
OC@T<M@HJM@NDHDGMJ OCJN@JA' JHK<M@DD<I ? LPDD@DF@OCJN@JA
) <<MG@) MJCI . <QJGH D?J@NI JO>JI ND?@MOC@' 4?8 4?4 Ï<M@GGKD>
=PO<>JH =D<ODI JAGI B NCJMOJMQ@TNCJMONJI BN>JI I @O@? OJ
AJMH <KJ@D>PI DOHD. <QJGH D 9 : & @H @ODI N) <<MG@

. <QJGH DHJ?Dé@ OC@N@N@JAODNGH @NJH @RC<O 1PNDEPJFNDNPJG<
HTJG@ D #I BGDCDNÏ 2 C@RJGAMI AJMOC@NR<H KD =POC@OMI NG@? DOD 'G<GH
RDOC 6BEE8 <??HCB ?HA: B<??4: B9ÍMPI OC@RJGA<MJPI ? OC@G<F@Î OJ F@K OC@<GDO
@MODI <I ? HPND<GDOTRDOC ?HCB RJGA <I ? OC@NBCOG@BOC GDD@MGMI NG<ODI
RDG=@6BEE8 <??HCB C8E?4 C4?H7@

) MCI ÎNOC@MTOC<O1R@DC #NOJI DI 0 PNNDI <I ? <GD>ÍOC@HI<
OD>G<I NÎ<M@KM@N@OD OC@$DI D>MPI JNJI BN<I ? C@R<NDAJMH@
<=JPOOC@ CNDDI @@HI @ONKM@N@OD OC@HI
. <QJHDDNB<OC@OC<ÖI JJI @NCJPG'EP?B@OC@$DI DNCKJ@HI<NOC@
?<47 JMOC@&7LFL <I ? M@K@OOC@HDNF@JA(POHPN) MCI RCJ
>NDDD@DN<POHN<I ? OC@>JI OM?DODJI ND DN>C<M<>OC@NDD<ODJI JA
>C<M<>OC@NN<N@KD>@@HI @ONOC<CR@N@RNDDO@ D JI @BJ <I ? =TJI @
KJ@OJI G <I ? I JOË<NOC@T<MËAMBH @ONJANJI BNROD>C?DA@NAJM
B@JBM<KOD<GJNBDN<I ?DHKJMNI >@. <QJHDD 66 &@AJPI ?
OC@C@N@NR@G>C<M<>OC@NDD@ <I ? <KKM@D<OC@ OC@R<TD ROD>CA<
HDFM@GODJI NDKN<M@M@KM@N@OC@ D OC@KJ@HI AJM@S<HKG@D OC@
><N@JAOC@BNDAJAOC@HJOC@NNJA* @HI HDFrD @ <I ? DJ &@K
KM@D<OC@ OC@KMJAJPI ? A@@DBNOJR<M?NI <OPM@I ? A@G OC<ODR<N
M@HI<NF<=G@ JOJI GFOC<O=DM?N<I ? <I DH<GN>JPG'G<GF =PO<GJ OC<O
ON@NJ=E@ONCJPN@NNRJM?N<I ?=J<ON>JPG'NPA@M@EJT<I ?CJK@
. <QJHDD>JI ND'@N@OC@ODBC@NLP<GDTJAOC@KJ@HI OJ=@D DNG>FJA
OC@<GAJMDJG@>@I ? <I D'@JGBTJAR<MNJ >@OM<GJ H<I TJOC@M
KJ@HIN

> =JQ@<GDDNI D>@OC<OD OODNAI GNDD<I ? <?Q@OPMJPNRJMG I @D
> OC@N=NPG<GAJM@I JMR@KJI N=PONKDNOP<GNOM@BOC <I ? OC@RJM? DN
> RC<CH<OOM@NI DODNRDOC OC@KJR@MJAH<BD>RJM?NOC<O4rDrH•D@
> @>C<I OC@ <I ? ?@A@OC@ (JPF<C<D@ . <QJHDD 66''

' 4I B?A<F EG6?8FBA G;8) <G@Q<G 4A7) HABFBA:F

. <QJHDDKM<DN@ OC@DMI TKM@N@OD OC@HD@NJAOC@' 4?8I 4?4 'I
C@RMJOC@I <MDD>G@JI OODNOJKD>D OC@N>D@OD@>EJPMI<G$D
I DN>C 3 BNDN>C@$JMN>CPI B@ &@NB<OC@ OC<ÖI ><N@NJADMI T=TCT
K@N4JG<M@AM@LP@O DODNOJG'OC<O<K@NJI <I <I DH<GJM<OOD BDN
I JOQ@MTNH<GJMGNB@<I ? MBCO<R<TDODN?@N>ND=@ <NBDB<I OD>JM
@SOM@HI @GODTED N@@<QJHDD &@<GF?@NOJ @S<HKG@NP>C
<NOC@AJGRDD BJI OC@<?Q@OPM@JA'GH<MD @<I ? OC@KDF@JA2PJ
I D̂

---

*•I I MJO@DO@JPO! CNDDI OC@HI @NRC@ NG@@OD B H @NAJMOC@' 4
?8I 4?4 JI ROD>C N@&TQ•I @ D OODNQJGH@

8<B8;4H><G8A8A G8A<	- AOC@KDF@NR<NI JOOC@G\MB@ND
8<>4•;4H><FFHEB8A FFHE<	, JM=@GI B@ C@OJ OC@NH<GGND
>8?<>4;G4 >EI8FF4EG4	2JI BP@OC@G@BOCJA?JP=G@C<OC@DN
;4@C4;4G;4E4I4A I4EEB8A	2 @@OC<NGI B<NA@ M4F@C<I ?G@N
>G4 >B?@8A >BF>8A I8EG4	+ JPOC<N=M<? <NOMDKG@NDM@H G@DN
F8?>4•F8<G8@4A I8A8;8A	<>F <NRD?@<NM@Q@ N@ =J<ON

" 4?8I 4?4 áááËáâß OM4I NGODI =T(JCI + <MDD ! MARAJM?

. <QJGHD D<GNJ @EJT@ OC@N<M<NH <I ?=G<>F CPHJPMKM@N@OD OC@OHD @N<=JPOOC@?@A@OJA(JPF<C<DI @ =T4rDIrH•DI @ RCJ H<F@NOC@TJPI B@M4C<GG@B@MNDFDI OC@NR<HK

!BALGAHEE<!BH>4;4<A8A	, JR DDR<NOC<O7JPF<C<DI @
=BC4 G8F< =BC4 GHAF<	! JHKM@C@?@ =POOJJ >G@MGF
G8F<G8?8 GH?8;8AF4	5 C<OODNAJGGF RC<OOC@@?R<N
@4G>4?8A BF4AA8;8AF4	- AOC@EJPMI@T C@C<? Q@OPM@
IB<G8B;BA ?4H8B;BA	4<DI GF C@C<? PI ?@M@F@
	$JMOC@BGJMT JA<>JI O@ND
>8E4I4A;4A-4•A4•@B•F8A	5 DOC OC@BM4I ? JG? 5 <DI<HJDI @

" 4?8I 4?4 âââËâââ OM4I NGODI =T(JCI + <MDD ! MARAJM?

'I OC@@? C@LPJO@OC@API I T@KDNJ?@DI RCDC* @HIHDI FrDI @ ?@A@?NODHN@AAMJH OC@<>>PN<ODI NJACPN<I ?N<I ?K<M@ON>JI >@MDI B OC@H<D?@NOC<OC@M@P>@ &DN>GNDI B<MBPH @ON@Q@G ODNÍKM@<QJMÎ<ODDP?@OJR<M?RJH@

$<A4•G<?A G<>4F4	7@OOC@QDMBDI N' <QJD?@
I4EB>A I4<@BA GG4E<4•	1CPI I @ OC@BJJ? <I ? NCPI I @ OC@@DG
>HA FHF<F<>B4 G<?<	1CPI I @ OC@CJNDJA>C<M4HDI B ?<PBCO@N
;4IH>4G>L?4A >4AB4	NOC@=G<>F RJGANCPI NOC@NC@K AJG?

" 4?8I 4?4 äèèËåßá OM4I NGODI =T(JCI + <MDD ! MARAJM?

'I . <QJGHD DRMJO@4I JOC@NGI B@M4MDD@ AGBEAB4?' 4?8I 4?4 9Í =JPOOC@' 4?8I 4?4Î: AJMOC@N<D@ODé>H<B<UDD@*GH7<7< <8B;B <4 $ B78EA4 9Í1OP?D@ND + J?@M . CDGGBTÎ: &@?@HJI NDM4C@NOC<OC@ FI JRNOC@ODNOJMTJAN<CJGMODKJI MPI JNJI BNLPDD@R@GGOMJPBC ODNLPJG<ODI JAO@O@N=T+ DF<@G BND>JG< " <I D@GPN@DPN! CMDD AMD%<I <I ?@M I ?@M(JC<I 1E•BM@ =M4C<H . JKKDPN0@DCJG? QJI @F@M8<>CMD2JK@@DPN<I ?! <MG S@@%JOOGI ? . <QJGHD 5 Ë &@?@N<MDB@ND <KM@DM@R<TCJR*•I I MJO>JHKJM@OC@' 4

?8I 4?4<I ?" 4AG8?8G4E . <QJGHD 5 Ë &@M@JPI ONOC@MNC@MC JA <FPNDD0 , D@HD<I ?@9KG<ID NCJR OC@RJMF=T(PGBPN) MJCI D êP@>@! JHK<M@DD. <QJGHD N@HI@?OJ=@Q@MTDOC@MNC@?D) <<M6@) MJCI ÎN' 4?8I 4?4AEHAB8A; <FGE<9Í &DDJMTJAOC@0 PI JNJI BNJA OC@) <G@Q<Gi: &@=@GDQ@?OC<OOC@H@OCJ?NJAOC@&DDJMD<G%@J BM4KOD>1>CJJGR@M@Q@MTPM@PGAJMOC@<I <GNDJAOC@AJGNJI BNJA ?DAA@M@OK@JK<G@N . <QJGHD 5 $JMM@?@MNOC<O<M@JO<> LP<ID OC@?RDDC OC@$DI IDC GI BP<B@C@M@JHH@?N<I <MDD@GDD %@MH<I =T) <<M6@) MJCI JI OC@N>D@OD>KP=GD<ODJI <AA<F6; , :E<F6;8 BEE6;HA:8A <I ?J=M@Q@?OC<O) MJCI ÎNOC@JMD@N<M@<GNJ ?@NHD=@?D OC@ <I DC=JJF" 4?8I 4?4 HB@9B?>7<GA<A: B A4GB44? 8GBF =T$@M?D<I ?- CMD. <QJGHD H@ODJI NOC<O) <<M6@) MJCI ?J@NI JO>JI ND?@M$DI ID>D ><I GODJI N<N<RCJG@OJ=@<KMJ?P>OJA $DI J 3 BMD>NC<H<I DH =@<PN@C@>JI ND?@MNOC@H<BD>NJI BNJA OC@$DI NJAOC@4JGB< 3 ?HPMDN+ <MDH<I ?+ JM?QD NOJ=@ÜG<I N JA0 PNNB<I D ><I GODJI N<I ?JAOC@G<G@! CMDMD<I @M4D . <QJGHD 5) MJCI R<NHJM@>JI QD>@JAM@G@DQ@GM@<@OG<I NAMJH I @DBC=JPMDB K@JKG@NOC<I JA<MC<D>1D=@MD<I <I ?$DI J 3 BMD> C@MD<B@

'I . <QJGHD DKP=GDC@?D <AA<F6; , :E<F6;8 BEE6;HA:8A < NCJMD>MDDLP@D 'G<GB<I JAOC@<MDD@GÄ AéI DD>G<NDDC@ @G 4?8I 4?4D 9Í! G<NDD<G AéI DD@NDD OC@ 4?8I 4?4Î: =T#BDDJ %@MPI UDC@?D<K KMJQ@JAOC@NDHKG@<I <GBDJ@N=@R@@*•II MJCÔN@KD<I ?! G<NDD<G HTOCJGBT . <QJGHD Ë 'I C@KP=GDC@?<I <MDD@GJI $DI IDC ND?@NRC@M@C@KM@N@OC@?ODNOMHI NG<ODJI JAAJMOTND?@N AMJH #GBN*•II MJCÔN<I OCJGBT*HB@8A>4AF4A4EB<GH>F<490 D?@N JAOC@$DI IDC. @KG@ - I OC@ ©JA$@MP<MT . <QJ GHDKP=GDC@?<GI B=JJF@OD OC@NM@NI ABFGE<DH478EA<?@D<OC@? OJ $DI IDC GOD@MOPM@RC@M@C@M@M@JAOC@DêP@>@JA" 4?8I 4?4 <I ?MPI JNJI BNJI OC@KJ@D><I OCJGBT 8?>4I <EF<X9. @OC@JNG<G 1JI BNÎ =TOC@KJ@#DJ*@DJ Ë 2C@=JJF@OD D>GP?@?OC@OMI NG<ODJI JAAJPMKJ@HIN=T*@DJ<I ?JA<N@G@ODJI JA

'I $DG<I ? OC@$@MP<MT OC DN>G@M@C@? <N) <G@QG" <T ABFGE<DH478EA<R<N<Q@MTDD @NDD BHJI OGK@MJ?D<G#<>CI PH=@M >JQ@M@<?DAA@M@OGD@MT KODGNJKOD<GJMKJGBDD<GJKD>'O>JI OMDPC@?OJ=M<? ><NDD B ODDFDB<I ?GD@MOPM@AMJH ?DAA@M@OD>JPI OMDNDD 'G<GT 2C@" DM@JM R<NOC@ ND@G<GDD<I ?'I ?JGBDD#I MDJ . <KK<>@<

OC@OO N=T DDJ) <GN & @GHD) MCI * <MD) T•MDD 4 @DFFJ I OC@M
) JNF@I D@HD<I ? (PC<I < & @DFFD#MFFJ 'I AJMOC@>@OC@<MT
JAOC@&?7 " 4?8I 4?4 C@KP=GHDC@ < MCJMD>@G=M4OJMT<MDG@D OC@
LP<M@MGF# 4 AHBI 4 4AGB?B <4 RC@M@C@>JQ@M? OC@DêP@>@JAOC@
KJ@HI JI OC@KM?P>ODI JAOC@RMDOMN G@HMN) DQD (PC<I D CJ<I ?
#DJ * @DJ OC@HPND>BI N(@<I 1D=@@PN 0 J=@MD) <E<I PN - NF<M
+ @MDF<I OJ #MFFD+ @G<MDD <I ?* @@QD I ODD+ <?@QE<I ? OC@K<DD OC@M
FN@H%<GI) <G@G< 2 C@AJGHRDI BT@MC@KP=GHDC@ <N@G@OCDI JA
GMD>NJI BNAMJH * •I I MJÔN) <I OC@G@<MD I PH=@M JA" 4?8I 4?4
F8HE4AIHBF<>E49Í7 @<M4JJFJAOC@ 4?8I 4?41J>DOC@Î:

+E4AF?4G8A <A ' EBF8 4A7) 87H6G8AF9BE ;<?7E8A 4A7 0BHA:
) 84?78EF

AOC@MOC@KJ@OD>OMI N8ODI N=T! J>>OD<I ?. <QJGHDDN@Q@M4GG@MDI N
JAOC@" 4?8I 4?4 D KMJN@<I ? M@P>ODI NAJMTJPI B M@?@MNR@M@
KP=GHDC@D 'G<GF GHJND@@@TB@@M4ODI C<?DONÚJRI Î" 4?8I 4?4D
'G<GI
2 C@éMD>JHKG@@OMI N8ODI D KMJN@R<N=TOC@KJ@O$MI >@NJ
?D1DG@MDD$<G>JI DMD OC@éMD@DODI R<NKP=GHDC@D <I ?
OC@N@JI ?D RDOC<GI BDOMJ?P>ODI
'I <NPHH<MTJA" 4?8I 4?4R<N<GJKP=GHDC@<GI BRDOCNPH
H<MD@NJAJOC@M@KD>KJ@HND OC@QJGPH @#88C8C88 <? <6?B A7<4AB
?®?478 ?® A8<78 ?4 8EHF4?8@@8#<58E4G4 " 4?8I 4?4 %<58?HA:;<
4A6+H?<8I 866;<78?4 <55<4 #HF47< ?4 <I<A4 B@@87<4 BA
;<F6BG89Í2 C@#KD>N 2 C@I ?D<I #KD>NOC@?<47 OC@8A8<7 !8EH
F4?8@ 8?48E87 " 4?8I 4?4 OC@%<58?HA:8A?87 ! ODGM@<I ?JG?H@
AMJH OC@ D=G@OC@ <I<A8 B@87L BA(H<KBG8 @DO@=T+ DBP@G
#N<G?< 2 C@=JJFR<NKP=GHDC@D OC@KJKPGMN@MDN D>JG D
=GJO@<?D1>D@U@+ J?@MI@Í1H<G? D=MMTJA+ J?@MI 1>D@>@Î=T
OC@KP=GHDC@DB>JHK<I T$M4OC@GD J>><#?DOJMD'ODNDOC@MNDDBOJ
J=N@MQ@OC<O" 4?8I 4?4 C<N=@@ N@G@<OC@? RDOCNJH@JAOC@BM<OC@ND
H<NO@MKD@>@JARJMP GBD@4OPM@
'I OC@M@P>ODI AJMTJPI BM@?@NI <A?4A7<4+8EE47< EB<
) 466BA<G74?' 4?8I 4?49Í$DGI ? * <I ?JA& @MI@NI2 <G@NAMJH OC@" 4
?8I 4?4: =T#G@<. MHD>@MJ R<NKP=GHDC@ 2 ODNP>>@NMPGRJMFC<N

=@@ M@KND O@? N@Q@4GDH @ND ⊲ ? DDDNDDGJI OC@
><GJBP@JAOC@H<EJMKP=GHDDD B >JHK⊲ T%dPI OD'I OCDN
=JJFR⊲NOM4I NG<OC@? D DOJ $M@>C . MDHD>@MD <GJ KP=GHDC@? ⊲ JOC@M
=JJF AJMTJPI B M@?@MJABM@ODHK<>O#8:8A78:8E@4A<6;89́%@M
H⊲ D>* @B@?NÎ %dPN@KK@ @I ⊲UU< Ë OM4I NAJM4H@? OC@
NJI BNJAOC@' 4?8I 4?4 D OJ AJPM@@ A<DMT G<G@NÏ AJM>ODG?M@ ⊲ ? JG?
K@KG@DD E4<6BAG<78?@4:B9́2 <G@NJAOC@+ <BD>D<I Î: JI @JA
OC@HJNOJMBDD <G=JJFNDD NKDM@=TOC@' 4?8I 4?4 'I ODNDOM?P>ODJI
OC@RMDD@MM@Q@<GNOC@K@<BJBD<GDD O@OJACDN=JJF $MJH OC@
OM4I NG<ODJI =T. <QJHD DC@ODM@? OJ J=G<DD

> G<G@N<FDD?JAA<DMTG<G@NI JO<O<GG=MPG<GJM?M@?APG$<=G@N<NNDHKG@
> <NKJNND=G@@NDGF<=G@OJ D NKDM@OC@DH<BDD <ODJI JAI JM4H<G>ODG?M@
> OJ DGGPNDM4@OJ OC@H OC@M@NJI NOJ ?DN>JQ@MOC@KC@JH@<JAI <OPM@
> ⊲ ? D>DD@OC@HOJ RJMF⊲ ? OJ GJQ@A<DMTG<G@N<=JPOI <OPM@⊲ ? GJQ@
> OJ @>JPM4B@OC@HOJ R<O>CI JOJI GFOC@G<I ? =PO<GJ OJ <?H DM@OC@
> NFT

. @I ⊲UU< ⊲N⊲I D O@G@OP<G⊲ ? RMDD@MR<NQ@MTM@NDDQ@OJ NJ>D<G
DNNP@NG><GDM4?DDJI N⊲ ? OC@OD@CJJ?JA>ODG?M@ & @RMO@<=JPO
K@<BJBT⊲ ? ?DN<=G@>ODG?M@ ⊲ ? O@@ND ' <6B?B@BA7BCE<@<G⊲B
9́ * DDDG@ MDHDDDQ@5 JMGÎ: & @<GJ RMO@<=JPOOC@G@
B@?NC<=DDN⊲ ? >PNOJHNJA Q@U⊲ J <OJRI D ! @OM4GG<GFOC<O
R<N?@NDMT@=T<?M4H<OD>@MOLP<F@D D ODNOJP>OD B=JJF
E4<6BAG<7< A:<M49́2 <G@NJA I BDDB<Î: 2C@N@NJ>D<G⊲ ? K@<
BJBD<GD O@M@NDN<M@<GJ @Q?@OD ODNRJMFJI OC@A<=G@NDNKDM@=T
OC@' 4?8I 4?4 D OC@DOM?P>ODJI . @I ⊲UU<D ?D<O@N<GHDOJAOJKD>N
⊲ ? HJM4GNOC<O>JPG? =@G<F@ AMJH @>C G<G@D JM?@MOJ =PDG? PK
>JI Q@MN<ODJI N⊲ ? <>DDDDD@RDDC>ODG?M@

'I . DDJ <Q< KP=GHDC@ ODNM@P>ODJI " 4?I 4?4 ?CB8@4
78??4 <A?4A7<4 A4EE4GB<A CEBF4 9́" 4?8I 4?4 2C@ J@HI JA$DDG⊲ ?
, <NM4O@?D . MNÎ@ I JOC@MM@P>ODJI +E4:?<8EB<7<" 4?8I 4?4 $ <G<
8?8:8A78[1] AA<6; @9́ HJI BOC@& @M@NJA) <G@Q<G< $DDI D>+ TOON⊲ ?
* @B@?NÎ =T%dJQ⊲ I DD ⊲ ?JI @I OC@@DBCODDNI @R OM4I N
G<ODJI N<KK@M@<NR@GG<NM@P>ODJI N⊲ ? M@KND ON* DG⊲ <! <GHI @MD
OM4I NG<OC@⊲ ? M@@?DD@? #4A7B9 8EB8F) 8G8??<A:B9G;8" 4?8I 4?4
=T3 MMPG<1TI B@ KP=GHDDD BDDD RDDCOC@DDDG@ 4<6BAG<

[1] A?4A78F< " 4?8I 4?4 9́$DDI DDC 2<G@N" 4?8I 4?4 Î: 2C@=JJF R<NM@
KND OC@?DD

'I %<=MD@G< BM<ODI ? + <MB* @DDB + <BDDKP=GHDC@ <
I @R M@P>ODJI JAOC@KJ@H @ODDG@" 4?8 4?4 G8EE47<8EB<9) <G@Q<G
* <I ? JA& @M@N RDOCDGHPNDM<ODJI N=T' Q<I %JI B<GJQ'I OC@DOM
?P>ODJI OC@DRJ <POCJMN RMDO@<=JPOOC@H @DDB=@R@@ * • I I
MJG<I ? OC@MPI JND B@M MODK<. @MOPI @ 2RJT@MNG@MOC@NH@
?PJ KP=GHDC@<I @R Q@MDJI D KMJN@" 4?I 4?4 $ <G<A6AG8F<@<8EB<
A8?4 : E4A78 F4: 4 78?CBCB?B A?4A78F89" 4?8 4?4 + TOON #I >C<I O
H@ON& @M@ND OC@%MGC1<B<JAOC@$DI IDC. @JKG@ N" @ I I <
C<NJ=N@M@ OC@<GOO@MDNI JOOM<I NG<O@ AMJH OC@$DI IDCJMBD<G
=PÖDN=<N@ JI OC@KJ@DD>Q@MDJI JA <QJGHD<I ? OC@KMJN@Q@MDJI
=T?D1DG@MDD$<GJI D@MDJI OC@KJ@DD>OM<I NG<ODJI D $M@>C=T(*
. @MO@ . <MDN <I ? OC@#I BGHDC OM<I NG<ODJI =T$. @<=J?T
+ <BJPI (M & <M@<M?3 I DQ@MDOT. M@NN Ð" @ I I <
@DB KP=GHDC@ D OC@Q@MTKJKPG<MN@MD@N- N<M+ JI ?<?JMD OODN
OM<I NG<ODJI M@H<DN JI @JAOC@=@NOFI JRI @Q@ DADR<NM@KND OC@
JI GFPI ODG - I OC@ND?@JAM@KND ON OC@M@P>@ Q@MDJI JAOC@
OM<I NG<ODJI =T. <QJGHDR<NM@KP=GHDC@D <I ?<I <I <NG<OD>Q@M
NDJI JAOC@=JJFJA JHK<M@DDR<NKP=GHDC@D

+; 8 + E4AF?4GBA B9G;8 " 4AG8?8G4E

2C@=@BDI I DBJAOC@D @DD@H<NFNOC@=@BDI I DBJAJI @JAOC@?MD@ND
K@MD?NAJMOC@ 4?8 4?4 D 'G<GAJM<GHJNéAO@@ T@MN J Q@MDJI JA
OC@KD>R<NKQD<=G@D =JJFNCJKN& JR@Q@MNJH@DDBC<KK@@
JI OC@ND?@JAOM<I NG<ODJI NJA* • I I MJÔN>JHK@?DPH JAHJNOGFGND>
MPI JNJI BN" 4AG8?8G4E D <NG@G@ODJI JAOM<I NG<ODJI N=T
. MJA@NNJM# @Q<3 JODG<I ? 0 @UJ . JM@?P R@M@KP=GHDC@D OC@
N>D@ODE>H<B<UD @ 8G8AGEB8JA2PMFP $DDG<I ? 3JODG<I ?. JM
>@?P ?@G<M@D OC@@MCJMDDOM?P>ODJI OC<OOC@TC<Q@M@NK@OC@
K<M<G@@DH <I ? RC@DDR<N JOOJJ ?DÁ>PGOOC@<GHD@M<ODJI <I ?OC@
MCTOOCH D>PI DDTJAOC@KJ@HN
2RJ T@MNG@@M <B<D D 2PMFP OC@NH<GGJ><GKP=GHDCDDB
>JHK<I T'MH<@ @DDJ ! <N<BM<I ?@#?DDJMDKP=GHDC@" 4AG8?8G4E
) 466B?4 7<?<E6; 8CBCB?4E A<A6; 89" 4AG8?8G4E ! JG@@ODJI JA JKP
G<M$DI IDC* TMDNÎ <=JJF>JI GDDDB<G<MB@M@G@ODJI JANJI BNOM<I N
G<O@=T. JM@?P 2CDN=JJF @DD@ =TOC@ MJA@NNJM* <PMD* D?

BM@ ⊲ I ?" @ I I <DNQ@T@@B⊲ ORDCCDGFNMO@DJI ⊲ I ? K<DD OD BN=T
FN@@%<GI) <G@G⊲ I ? <ND OM?P>ODJI <=JPOOC@NCJMTJA" 4AG8
?8G4ED 'GGJA@M@=TOC@ORJ @DDJMN
'I . <PG* JDF<G<KP=GDC@D JGBI <OC@>JG@@DJI ⊲A
?4A7⊲4E46BAG4G474?87BAA8 AGB?B⊲478<64AG<GBGB?4E<9$DI G⊲ I ? <
* ⊲ I ? 0 @JPI O@=T5 JH@ I I OCJGBTJA$JGFNJIBNÎ 2C@
N@@@ODJI D>G?@N<GNB@N@@@ODJI JARJH @ÎNGNDNAMH " 4AG8?8G4E
⊲ I ? JAMPI JNJI BNAMH OC@QJGPH @NJA*HB@8A" 4AF4A- 4A;4G) HABG
9Í I >D@OO PI JNJI BNJAOC@$DI DC. @KG@ 2C@OMI NGODJI N=T
* JDF<G<M@ODO@MG⊲ I ?<>>JHK⊲ I D@=TO@ODND OC@JMBD<GI BP<B@
OC@T⊲M@<Q<G? DNDPH @OAJM G<GI NOC<OR⊲ I OCJ DHKMQ@OC@DM
FI JRG@B@JAMPI JNJI BN

+E47<GBAF4A7 *GH7<8F4GG;8 8 <AA<A: B9G;8 FG 8AGHEL

OOC@=@DDI DBJAOC@ @R HDG@@I DPH I J'G<GI OMI NGODJI JA
" 4?8 4?4 R⊲N<Q<DG=G@JI OC@H<NF@@=POOC@NDP<ODJI C<N>C⊲ I B@
<GJO<A@@NJH @T@MN" ⊲MJ %DI N<I ODC<NKP=GDC@ OC@>JHK@@@
OMI NGODJI JA <QJGD DJI OC@R@ND@ DAMNORDOC=JOC OC@G<GI
⊲ I ? OC@JMBD<G$DI DC@O- I OODR@ND@DDNKJNDG@JM@?D
'G<GI OC@DOM?P>ODJI NOJ OC@" 4?8 4?4 =T* • I I MO ⊲ I ?
! MARAJM? ! DHKJGD ⊲ I ? . <QJGD D ⊲ I ?
'I %DI N<I OD<GJ KP=GDC@ OC@MD@G@?" 4?8 4?4 ' B8
@478?4 A4GHE4 878?4 C4EB?4 6E84GE68 9Í 2C@ 4?8 4?4 . J@I JAOC@
, <OPM@I ? JAOC@ M@ODQ@5 JM?: AJMOC@G<GI 2JGDD@DI NJ>DOT
DDKMKJN@ NJH @>JHK<MDJI N=@R@@ $DI D> 3 MGD> ⊲ I ? G<D>
+ TOCJGBT ⊲ I ? <GJ RDOC0 PNNBI @KDN
'I OC@KP=GDODB >JHK⊲ I T'G! @MOJ M@KP=GDC@ OC@
>JHK@@@OMI NGODJI =T. <QJGD DRDOC ODND OM?P>ODJI =PO
RDOCJPOOC@$DI DCJMBD<GO@O OOC@@?JAODN=JJF⊲M@OM@@
⊲MDG@N=T! @DB< ⊲M@G⊲ I ? 0 J=@MJ M?PDD<=JPOOC@ 4?8 4?4
OC@ 4?8 4?4 D 'GGF⊲ I ? 2JGDD@ ⊲ I ? OC@ 4?8 4?4 'I <AM@@
Q@M@OMI NGODJI JAOC@ 4?8 4?4 =T+ ⊲M@G %⊲ I ⊲NDDR<NKP=
GDC@ 2CDNOMI NGODJI DNQ@TG@MG⊲ I ? OC@M@<M@<GJOJAI JO@N=T
OC@OMI NGOJM⊲ I ?>PM<OJMRCJ C<NN>NPODDM@ K⊲MDDPG<MGD BPDND>
⊲ I ? @OHJGBD<GA@OPM@NJAOC@@KD> 2C@=JJF D >G?@NORJ DOM

?P>ODJI =T* • I I MJO ⊲I ? ⊲I ?⊲GNJ <I @R ⊲I ? DI OQ@NMOD B DI OMJ?P>ODJI =T" @ I I <

AO@M⊲GI BK@MJ?JANG⊲NDNJH @ @R K⊲MOD⊲GKJ@OD>OMI NG⊲OJI N JA" 4?8I 4?4 C⊲Q@⊲GNJ =@@ KP=GDNC@ , D>JG⊲0⊲ID~ ⊲I ? OMI NG⊲O@ 0 PI JN ⊲I ? DI ⊲I J>OJNTG⊲=D>H @OM@2 C@OMI NG⊲OJM PN@ ⊲GBOQ@M⊲ODJI ⊲I ? MCTH @OJ BDQ@OC@OQ@O MCTOCH ⊲I ? H PND⊲GBOT =POD <AJMH OC⊲ODNI JO⊲GR⊲TN⊲I ? >JH KG@O@GOMP@OJ OC@JMBD ⊲G 0⊲ID~ ODBCGBCONOC@H PND⊲G⊲NK@OJAODNOMI NG⊲ODJI ⊲I ? OC@I @ >@NNOTJAPI ?@NH D BOC@DH KJMH >@JANJH @RJM?NJMOJKDN⊲GNJ⊲O <NPKM⊲N@BH @I G⊲G@@Q@G

OOC@@@Q@GJAOC@M@P>ODJI AJM>ODG?M@ ?" 4?8I 4?4 ⊲A?4A7⊲4 G8EE47⊲8EB⊲=T. MDH D>@MJ R⊲NM@KNMD OQ@D ⊲I ? DI #4$ 4 :⊲64G8EE47⊲" 4?8I 4?49ǐ2 C@+ ⊲BD⊲G ⊲I ?JA" 4?8I 4?4Î: R⊲NKP=GDNC@ 2 ODNGNODN⊲OMI NG⊲ODJI JAOC@API I T⊲I ?DH⊲BDI ⊲OQ@DGPNOM⊲O@=JJF AJM>ODG?M@" BE⊲8A" 4?8I 4?49ǐ2 C@ ⊲I DI @' 4?8I 4?4Î: =T+ ⊲PMJ) PI I ⊲NOC⊲OC⊲N=@@ LPDO@NP>>@NMPG

0 @@OGF OMI NG⊲ODJI NJA?DA@M@O⊲MOD⊲G@N⊲I ? HJI JBM⊲KONI=T $DI I DNC N>CJG⊲NMJI " 4?8I 4?4 ⊲I ? MPI JNJI BNC⊲Q⊲ ⊲GNJ =@@ KP= GDNC@ 'I Ï' G⊲8GX=Xé I I DD@G N>DH ⊲I @NDH JD9ǐ$DI I D>G8GX=XG ⊲I ?NC⊲H ⊲I DNH Î: R⊲NKP=GDNC@ 2 ODNGI B⊲MOD⊲G@DN=⊲N@ JI NJH @ >C⊲KO@NN⊲I ? K⊲MBM⊲KONAMJH OC@HJI JBM⊲KC* HB@4?4⊲A8A w4@4 A⊲F@⊲ =T. MJA@NJM I I < * @@⊲1DF⊲G 'I OC@N⊲H @T@MORJ ⊲MOD⊲G@N=T. MJA@NJM(PC⊲. @ODFrDI @ JI OC@$DI J 3 BMD>OM⊲? DODJI N⊲=JPOOC@=@MR@M@KP=GDNC@ Ï1PG@JMH @?@G?@GJMNJ 'G KMDH DOQDH J ⊲MODJ I @G⊲H @ ⊲G@o @PMJK@D9ǐ- I OC@2 M⊲>FNJAOC@ @M M⊲OD. MDH DOQDH DI #PMJK@I + @ ⊲GBOÎ: ⊲I ?Ï. JKJGG?@G Ĝ MK+ ⊲BBDJM@D9ǐ2 C@ @JKG@JAOC@%M@O @MÎ 2 C@KM@N@O⊲POCJM ⊲GNJ KP=GDNC@ OC@⊲MOD⊲G@Ï! ⊲I OD@MODK@MG⊲>⊲>D⊲GĜJMNJ D) ⊲M@G⊲ @D 1⊲QJD9ǐ1JI BN⊲I ?0 DOP⊲GNJAOC@ @M& PI OD) ⊲M@G⊲I ?1⊲QJÎ: . DG?P > JOC OC@@8CD=DODJI N- MD@1>DH ⊲I D9ǐ @MK⊲I ? 1C⊲H ⊲I NÎ ⊲I ? OC@N>D@OD>>JI BM@NA@NDQ⊲G⊲I ? @8CD=DODJI JI Ï) ⊲G@Q⊲GDJMB⊲I DJ@ DI ! DQ?⊲G@?@$MPGDI =TOC@) ⊲G@Q⊲G 1J>D@T⊲I ? OC@ NNJ>DUDI @+ PND⊲G@Ï1@MBJ %⊲BBD⊲DKGT@ ⊲I

0 @@OGF %⊲I ⊲NND D⊲GNJ KP=GDNC@ OMI NG⊲ODJI NJAORJ JOC@M>G⊲NDNJA $DI I DNC GDQ@M⊲OPM@M@G⊲O@ CJ OC@RJM?JAOC@' 4?8I 4?4 4AG⊲7⊲' 8AG8BFG8 8? >X ⊲EEX9ǐ. @G>JNO1JI BNÎ ⊲I ? =T#DJ * @DJ ⊲I ?' 4AH =T (PC⊲I D CJ

DHKJMGI OMG@D MDDD BFI JRG@B@I ?<R<M@@NN<=JPO) <G@Q<G D QMDPNNDP<ODI N<I ?AJMPDA@M@OFD ?NJAKP=GN

'I OC@KP=GDODB>JHK<I T#?DDDI D. @MI@HKM@KP=GDC@ #4@<GB2B<478?"4?8I4?4 RODCDN" 4?8I4?4A@44<?@495 JMGJAOC@ "4?8I4?4: =T(PC<. @ODFrD@ KP=GDC@D #IBGDCRDOC OC@DOO@" 4?8I4?4$ LG,B2BLD 2C@OO@ORODCDNOMI NGO@ <I ?@DO@=TOC@KMN@OO<POCJMDN@K<I ?@<I ?M@QD@ OC@M@<M@ I@RKCJOJN<I ?<??DDDI <G@O@ONI JO@N<KK@?D@N<I ?DAJMH<ODI AJMOC@G<GBI M@?@M2C@=JJFC<N=@@M@KMDO@D =TOC@ KP=GDODB>JHK<I T4J>DAPJMD>@< RODCJK@@RDOCDOOC@@R =JJFN@MD@N<AA<64<=JPO$DIDDHTOCJGBT<I ?@KD>'I <AA<64C<N <G@M@?T<KK@<M@OC@M@<@O ?<7[<7< <A?4A7<487< 4E8?<49%J?NJA $DIG<I ?<I ?) <M@GI: $G<QD<?D* PUDÎNOMI NGODI JAOC@#H@4?4 ?HGG2B9* DOJAOC@%J?N =T+ DF<@G BND>JG Ë KP= GDC@D D OC@DOM?P>ODI OJOC@$DIDCOMI NGODI JAOC@ 'F4?8E<H@ >JHKNDM@JA NGHNAMH OC@ G2@NGH@O BND>JG R<NOC@éMD DCJK<AOMDOC@* POC@MI 0@AJMH<ODI <I ?ODDJG KJ@D>O@OË?Dé>PGOJ D O@KMDË DNOC@JG@?D?J>PH@OJI AJG =@G@AND $DIG<I ?'I OC@=JJF OC@DOMI NGODI DN<>>JHK<I D@=TOC@ JMDBD<G@O@O<I ?<Q@MDI D HJ?@M $DIDC 2C@OO@ODNAJGR@ =TH<I TK<B@NJA<I I JG<ODI N<I ?@K<GI <ODI N<=JPOOC@?@DDD@NJA OC@ÎGDÔ RODCR<NHJNOF>JHKND@JABP<M?DI NKDDDJAI <OPM@ <I ?>C<M>@MOC<ODG@DM?DDI NJA@KD>MPI JNJI BN<M@KM@N@OC@ HJM@NC@M@NP>C<NGH<MD@

'I >JI >GPNDI OC@KMN@O=JJFDKNDO@<O<AJMPDOPNDH@D RODCOC@" 4?8I4?4<I ?$DIDDCHTOCJGBTN@HOJ=@B<DDDBD O@M@D<B<D <HJI B'G@GI N, JOJI G<M@NQ@<G@MI NGODI NJAOC@ @KD>I JRJI OC@H<NF@O=PO<I @R<I ?@DB@OKP=GD>C<N=@@=JMI <KP=GD>D O@M@D@D FI JRDDBHJM@=JPOC@AND<ODBRJMG JA MPI JNJI BNOCJPBC@NKTN<I ?N>D@OD>GDO@<OPM@

$MJH OJ N@@<G@OD=DODI NJI OC@NOJKD>NR@MJB<I D@D HPN@HN<G<MPI ?'G@ $G@M@>@ JGBI<. <G@HJ .D@MG 2PND 1< +D>C@G<G ?DB@2M@OJ !DD?<G@?@G$MPGD 3?D@ !JI@BGI J 2M@ODJ 2C@O@ONJAOC@O@D=DODI >JOM@? 1D=@MI NC<H<I D>OM?DDDI N OC@$DIJ) <M@GI =@MCPI OMDP<G<I ?NJH@M@AM@>@NOJ OC@=@<M@KDN?@D OC@" 4?8I4?4 2C@J=E@ONDD ?DKGTR@MOC@K<MKC@M<GJAOC@1D=@MI >JG@ODI JA(PC< . @ODFrD@<I ?JOC@MD@HNJA>JG@ODI NJAOC@GJ>GHPN@HN

#<@E4GHB8

%0 2' %<=NDGG + %,' + <NB* @DDJK "4?8I4?4 +8EE47<8EB<
+DGIJ +JI?<?JND

Ì OM4IN #GBN*•IIMJO9 : "4?I4?4 $<G<A64AG8F@<8EB<
.MJN@OM4INB<ODJI +DGIJ +JI?<?JND

0"3',' 0J=@MDJ 0#** !@DGB< Ï'G'4?8I4?4 .J@HI<I<UDJ
I<G@éIIDJDËÏ'G'4?8I4?4D 'GGB<DËÏ2JGHD@ @DG'4?8I4?4D'I #GBN
*•IIMJO ?'4?8I4?4 'B8@4A4M4BA4?8¹AA<6B 0DHIDD'G@M4ODJ

4 .DJ "4?I4?4 ?OB8@478?4 <A?4A7<4 A4EE4GB<AOEB4 1#' 2JNDJ

!'c+.-*' "JH@DJ Ï'IOMJ?PUDJI @D'I #GBN*•IIMJO"4?8I4?4
'B8@4¹AA<6B OM4INB<ODJI =T'BDJ! J>>OD! DDDo?DI <NO@GG 1J> 2DK
#?DDND@ JJK@M4ODQ@

!-!!&' 'BDJ #4 <A?4A7<4 E<6BE7<8FGH7< $DM@U@* @+ JIIDM

Ì OM4IN #GBN*•IIMJO9 : "4?8I4?4 'B8@4¹AA<6B &@?@
><NTGG=D>OM4INB<ODJI !DDDo?DI <NO@GG 1J> 2DK #?DDND@ JJK@M4ODQ@

!-+. 0#22' "JH@DJ 9 : ?'4?8I4?4 B#4OB8F<4GE47<M4BA4?8
78< <AA<*GH7<BFGBE<6B6E<G<6BFH?8BE<<A<78?8:E4A7<8OBC88A4M4BA4?<
+DGIJ %P@MDD #IBGHCOM4INB<ODJI +;8+E47<G<BA4?' B8GHLB9
G;8 <AAF*JI?JI

" 0-1! 0J=@MDJ Ë #4E4COE8F8AG4M4BA878?4 <A?4A7<4A8?
?5EB #4 <A?4A7<4 E<6BE7<8FGH7<° 78?OEB9 :<AB B66;<.C' 2C@NDN
&@GNDFD&@GNDBD 7GJKDNOJ

#1! * " +DBP@G #88OBC88 2JNDJ $M4O@GD J>><

"# ,, *PDBD Ï"JH@DJ! JHK<M@DDDG) <G@Q<G@GKJ@NB<?@D
$DIDD1@@@ONDI@I@R N@NO@N 2PMFP .K

Ì Ï.M@A<UDJI @D'I #GBN*•IIMJO"4?8I4?4 <?:E4A78OB8@4 8G<6B
¹A?4A78F8 OM4INB<ODJI =T+ <M4@GG %<I <NNDD0JH< + @DD@M4I @@

"#! .0'- 4DD>@UJ ,A:8A8E8?8GGE4E<B<AFG45<8 *H?4 E8?4M4BA8
78?I<4::<B4? 4OB%BE7 7< <HF8OC8 68E5< 5 DOCÏ4D<BBDJ DD
*<KKJIDBD0JH< M4ODQDJ %PD?J'UUD

"' 1'*4#120' $ *!-,'#0' $M4I>@NJ OM4IN "4?8I4?4 OBC84
A4M4BA4?8¹A?4A78F8 *<I >DIJ ! <M4==<

$-% 88 0- IOJIDJ 7<??<FO8MM4G<) 466BAG<5E8I<+ DGIJ <G?DDD
!<NOJG?D

Ì $ <A<@8 *GH7< 7<F6BEF< OBAF<8E< + DGIJ <G?DDD !<NOJG?D

%, 11',' +<M4@GG OM4IN #GBN*•IIMJO9 : "4?8I4?4 <?.E4A
78OB8@48G<6B¹A?4A78F8 $M@@Q@M@NOM4INB<ODJI 0JH< + @DD@M4I @@

Ì OM4IN #DDJ*@DJ9 : 4AG<7<' 8AG86BFG8 1@NDJ 1<I
%DJQ<IID+ DH@NDN

Ì OM4IN (PC<ID CJ9 : '4AH 4J>DARJNDN>@<4DD@M4J

% , 1 , 2' " <NJJ Ï'G) <G@Q<G KJ@H<?@G&I<OPM4@?@G&K<MJG
>M@OD>@D'I + D<N2DMDC 3?D@1J>D@@2JGD@DI<
& 32 * (JPFJ *HB@4?4<A8A>4AF4EHABH78AGHG<@HF&@@NDFD
) 0-&,) <<MG@ Ï" !JHK<M@DD) <G@Q<GOPOFDHPND4<GQJE<
&@@NDFD1) 1 .K
) 3, , 1 + <PND #4@4:<64 G8EE4 7<" 4?8 4?4 + DGI J 'GBDJ>J ?D
G@BG@M@ $DI @ " B<E<8A" 4?8 4?4 - GQ< &@@NDFD
. 4-*', ' .<JGI#HDGJ Ï'GKJ@H<@NJIDJ?@G 4?8 <GB.8D, PJQ<
<IOJGBD<6664'' 0JH<
Ì Ï3I<Q<NBIQ@?@G<?C4?4H?4AG4M>>JG<?dDHrrMQDD%dJM<G@
?@G<1J>D@@<NB<OD<D<GBI<64''' $DM@U@.K
Ì OM4IN #GBN*•IIMJO9 : ?" 4?8 4?4 'B8@4 A4M4BA4?89A
A<6B - >OJNTG=D>OM4I N<BODJI *<=D<GDJO@<?@KJKJGD.<G@MHJ 0@
HJ 1<I ?MJI ! ?@DDDJI 0DHIDD'G @MCDJ
Ì Ï'IOMJ?PUDJI @D'I #GBN*•IIMJO ?" 4?8 4?4 'B8@4 A4M4BA4?8
9AA<6B 2M4I N<BODJI =T. # .<QJGHDD0@HJ 1<I ?MJI .<G@MHJ ! ?
@DDDJI 0DHIDD'G @MCDJ
Ì 4 Ï*ÎDMJI B<I@G" 4?8 4?4D $DIIDN<C 3BNDN<C@$JMN<CPI B@ 8@DD
N>OMDAO1PJH<GDNPBMDGD@1@PM4 &@@NDFD
Ì 5 Ï'IOJMMJ<G" 4?8 4?4 IJODDJ@@N<BBDD 1OP?D?DAOGJGBD<HJ
?@MI<'' +J?@<
Ì Ï AéIDO>GNNDC@I@G" 4?8 4?4D 0DQDDG<?_'GG< $@MP<MT
0JH<.K
Ì OM4IN #GBN*•IIMJO9 : A7BI<A8??<1 AA<6< 'IJNOMDLP<
?@MIDT@M =JJFG@@4'' *<I >D<I J
Ì JJFG@@?@D<O@OJ $DIIDNCGB@@M4OPM@'IJNOMDLP<?@MIDT@M
'4 =JJFG@@'' *<I >D<I J
Ì OM4IN #GBN*•IIMJO9 : ?" 4?8 4?4 'B8@4 A4M4BA4?89A
A<6B =MDPB@QGMMDJI 1<I NJI D+ DGI J 0@KMDON
Ì 4 Ï'GKNDHJ >@O@<NDJ?@G 4?8 4?4D, PJQ<<IOJGBD<0JH<
Ì Ï) <I O@G@@G<M@ MPI JE<D<GBFNDD) <G@Q<GN@PM4I QPJNDFDNE<
.JMQJJ 5 1-7 .K
.#, , 88 %dPN@KK@ E46BAG<78?@4:B JGBI< 1J>D@@2DKJ
BM4é><+ <M@BBD<ID
.#, 2') d', #, (PC< Ï'KJKJGD?@G= MKH<BBDJM@D'I + <MB<%dGMB<
0JN@GD@ RDOC>JG<=JM4ODJI JA4@N<+ <O@@.DG?P &EE<8*64@4A<
84EF4A7*; 4@4AF$DM@U@#'' '$'0
Ì 4 Ï1PG@JMH@?@G=JMJ 'GKNDHDDQDDHJ <MDD>JI@G<H@G<GB@@P
MJK@GD'I %dG=@MK%JGHD@GD@ ? E<@<G<F@B8?8FHB@8G4@BE9BF<
E6; 8B?B:<4 7<HA7<F6BEEB6HG<E4?8 JGBI< ! GP@
Ì #4@<GB?B:<4 78?" 4?8 4?4 + DGI J .@M@HKM@ ! ? @ 4D
O@M4J 4J>DAPJMDN@< $DIIDNC@DDDJI " 4?8 4?4A $ 44<?@4
&@@NDFD7GJKDNJK<DJ

. '*3"3 4@N+ <OQQ @ 4 *H?8G4668 78?4 E8AA4 78?6[illegible] F6E<G
FH?B F64@4A8F<@B ABE7<6B 7<!H; 4' 8AG>X<A8A 8 AA4 #8A4 *<>4?4
! ODNBHJ 0JH< PGUJID

Ì 5 4AG8EGC8E?464664 4?[illegible] A" 4E8?4 8A8?*4 IB 'I + <NB%GJ
NB0 JN[illegible] @ RDDC>JGG=JM4ODJI JA4 @N+ <OQQ. DG?P &EF<8*64
@4A< 84EF4A7*; 4@4AF $DM@U@#" '$'0

. -0! #" "3 0@UJ OM4I N #GBN*•IIMJO9 : " 4AG8?8G4E 2PM
FP 'NH<@ @DQJ! <N<BM4I ?@

. 0'+ '! #0'- #G@< <A?4A7<4 G8EE4 7@EB<) 466BAG<7<" 4?8 4?4 0@
?P>ODJI AJMTJPI BM@?@M$DM@U@ @HKJM4? I? @ ?' 4?8 4
?4 <A?4A7<4 G8EE4 7@EB< $DM@U@%dPI OD+ <NUJ>>J M? @ $D
M@U@%dPI OD

0 ', i , D>JG OM4I N #GBN*•IIMJO9 : " 4?8 4?4 +E47HMBA8
78?EHAB II ¶¶¶ ·¸¸ NBJ JGBI< . K

Ì OM4I N OM4? #GBN*•IIMJO9 : " 4?8 4?4 +E47HMBA8 78?
EHAB64' 'I 0 I ?MJI D>J . <M@Q@ + 4DD8N<GJ @N A6BE4
<@C4EB &@NDFD2C@ D@4>>DID$JPI ?<ODJI . K

0 , " - , # %dJQ<I I D +E4: ?<8EB<78?" 4?8 4?4 @<G8?8 : 8A78¹ AA<6; 8
0@P>ODJI AJMTJPI BM@?@M. <G@MHJ 1GHK<OJMD NNJ>D OD

0- 1#**' + <NB%GJNB @ RDDC>JGG=JM4ODJI JA4 @N+ <OQQ. '*3"3
&EF<8F64@4A< 84EF4A7*; 4@4AF $DM@U@#" '$'0

1! 3" '#0' %dBI >< NGH Ï'G' 4?8 4?4 ?D <NGH ! <OBI @D 1@Q@ ONDJI @
'' 2PMFP 'NH<@ @DQJ! <N<BM4I ?@. K

1#2d*d #@HDG; @NJM Ï) <G@Q<GI FrrI OHEDMr E<FrrII•FNDMr 'G<
GBI) D@D 4<GJE< &@NDFD1) 1 . K

1'') * II<*@@< *HB@4?4<A8Aw4@4A<F@<&@NDFD1) 1

17, %# 3NMPG<) 466BAG<9A?4A78F< M@N<D< *<1>PJG< ND @DQJI
#4A7B9 8EB8F4) 8G8??<A: B9G;8" 4?8 4?4 OC@ @PH , @R 7JMF

2 0%- , ' 2- 88#22' %dJQ<I I D Ï) <G@Q<GI @NDHIHrDM@OD[illegible]
FrrI OrEOD 4<GJE< &@NDFD1) 1 . K Ý 'G<GBI Q@MJDI
Ï'KNDHDOM?POQJMD[illegible] D?@G 4?8 4?4D 1@Q@ ONDJI @ 2PMFP
'NH<@ @DQJ! <N<BM4I ?@. K

3- 2'* #@Q< Ï*<?JII<I @G<KJ@NB<KJKJGM@IGI ?@N@[illegible] <D
1@Q@ ONDJI @ 2PMFP . K

5 '1 0J=@MJ Ï IQJID $JB<U<MJ @DG' 4?8 4?4D 'I 0J=@MJ 5 DN
@ +8EE4 5BE84?8 FGH7<G4?B ¹ A?4A78F< . JMQJJ 5 1-7 . K

AG8EA8G* BHE68F

'$0k12 #G@OMJID>KP=GH<ODJI JA <QJGHD OM4I N*•IIMJO
Q<DG=G@O COOK =DAMJNODD IQJGBD<) <G@Q<GCOHG