```
"#$ %&' ((!)$ *+,,+#
 -#+./0+1(2103,'405$6'7+,,-#'8+..'#'89:+; /.(#4
  <2=2.:\dot{9}'_{,,+}+
?@A!<$ < 2=2.: BC+
9#278' #0.C/..+ DE FGH??
'88/&+ IGJKL?JAMJNNF
+M: 2/.8+..+#.O72=2.:$+OP
012+34567
                  -: $"$Q -: 4./&2, 9: +; /. (#4Q R1/C+#./(4 ' 8 92,/8' #1/2Q " 2C/.$ " +& AHH?$ "/...+#(2(/' 1$
                 BTT,/\&2(/' 1 ' 8 (: + 64T + #1 + ((+0 9: 2/1 BTT #' U); 2(/' 1 (' (: + ), +&(#/&2, "' P=, + 324 + #$ BOC/.' #$)
                  "#$ " ' 12.0 B$ V&WP2##/+$
                  5$B$Q V2X' #$ 9: +; /. (#4Q V/1' #$ V2(: +; 2(/&.Q < /,,2; +((+ R1/C+#./(4Q V24 AHYH$
318575! 49345. 0%0: : 09507+0
                  -\#+./0+1('8(:+9',+>+0!<2=2::9',+>+0!N@N@MT\#+.+1(
                  " +21'8(:+9',+>+19:/+8B&20+;/8!Z88/&+\#L0 < 2=2.:9',+>+0N@AFMN@N@$
                 9: 2/\#0 " /C/./' 1 ' 8 E2(P#2, %&/+1&+. [ V2(:+; 2(/\&.0! < 2=2.: 9', +>+0!)@@HMN@AF$]
                 9: 2/\#0" + T2\#(; +1('89: +; /.(\#40! < 2=2.: 9', +>+0!N@@JMN@@H$)
403 + < 57 = 0: 0.09507 + 0
                  -\#'8+..'\#'89:+; /.(\#40!<2=2.:9',,+>+0!N@@HMT#+.+1($
                 B. ' \frac{8}{2} + -\frac{4}{8} \cdot \frac{8}{1} \cdot \frac{4}{1} \cdot \frac{8}{9} \cdot \frac{1}{1} \cdot \frac{40!}{1} < 2 = 2 \cdot \frac{9}{1} \cdot \frac{4}{1} + \frac{1}{1} \cdot \frac{1}{1} 
                 B.../. (21(-\#' 8+...' \#' 8 9: +; /. (\#40! < 2=2.: 9', +>+0 AHHYM)@@?
                 \/./(/1> B../. (21(-#'8+..'#0!<:/(; 21 9',,+>+0!AHHJMAHHY)
                 ]+2&: /1> B. ./. (21(0!R1/C+#./(4 ' 8 92,/8' #1/2 2( " 2C/. 0!AHYHMAHH?
90!039+< 0: : 09507+0
                  \/../(/1> \%8/+1)/.(0.05 \/ ^+.+2\#8: _ < 2(.'132='#2('#40''#a('716+/>:(. E'0.Jb@FMJb@G$)))
                 -\frac{1}{8}T^2, D^1C^+. (\frac{1}{2}(\frac{1}{4})! + T^2#(\frac{1}{8})! + \frac{1}{8}(\frac{1}{8})! + \frac
```

-#/1&/T2, D1C+. (/>2(' #0!" +T2#(; +1(' 8 9: +; /. (#40! < : /(; 21 9',,+>+0!HbHJMGbHY\$

 $\frac{\%(288 *+,,')}{7}$ 0!9+1(+# 8' # 5/',' >/&.)C2,P2(/' 1 [ ^+.+2#&: I\*" B ,2=' #2(' #4 2( (: + E2(/' 12, I) 1. (/(P(+.!' 8 6+2,(: L0 NbHFMYbHJ\$ %PT+#C/.' #\$ "# ^/&: 2#0 -2.(' #0 5/' T: 4./&. 32=' #2(' #4\$)

 $\frac{\/./(/1>^+.+2\#8:+\#0}{1}R1/C+\#./(4'83+/Tc/>0V24AHHJ$ %PT+#C/.'#$ "#$ *#21a \',a+0"+T2#(;+1(!'8-:4./&.$$ 

<u>^+.+2#&: B../.(21(0!</u></,,2; +((+ R1/C+#./(40!HbYYMKbYH\$ %PT+#C/.'#\$ "#\$ B#(: P# -24(' 10 "+T2#(; +1(!' 8 9: +; /.(#4\$

## 0: 40973> = 9374!

 $E2(/'\ 12,!\% + 1 + !*'\ P102(/'\ 1\$!]/(,+\$!^R | S| | B('\ ;\ /.\ (/\&\ V'\ 0+,/1>!'\ 8!V+;\ =\#21+!-\#'\ (+/1.\$!B;\ '\ P1(S+A0KFJ\$-+\#'\ 0S\ JbAKbN@AKMJbAKbN@N@\$)$ 

$$\begin{split} & \quad E2(I'\ 12,!\% I+1\&+!*'\ P102(I'\ 1\$!]/(,+\$! \lor ^0\$!B\&i\ P/./(I'\ 1!'\ 8!2!9'\ ;\ TP(+\#!9,P.\ (+\#!8'\ \#P10+\#>\#20P2(+\ 9:\ +;\ /.\ (\#4\ ^+.\ +2\#\&:\ !210!]\ +2\&:\ /1>=4\ (:\ +\ \lor/07+.\ (\ R10+\#>\#20P2(+\ 9'\ ;\ TP(2(I'\ 12,\ 9:\ +;\ /.\ (\#4!9'\ 1.\ '\ \#(/P;\ IVR?9L\ B;\ '\ P1(\$\ fNHH0HFN\$\ -+\#/'\ O\$\ A@bAbN@A@M\ Hb?@bN@A?\$\ 9'\ M-D\ 7/(:\ j\ \#P+>+\#0\ -'\ ,/a0\ j\ P72(20\ [\ j':\ +1\$) \end{split}$$

E2(/' 12,!%&/+1&+!\*' P102(/' 1\$!!]/(,+\$!!^RD\$) UT,' #/1> 3/T/0 D1(+#2&(/' 1. R./1> B(' ; /.(/& V' 0+,.\$! B; ' P1(\$ fFKF0AAF\$! -+#/' O\$ KbN@A@MKbN@AK\$

6+1#4"#+48P.]+2&: +#M%&: ',2#B72#0\$!]/(,+\$9'; TP(2(/'12,.(P0/+.'8,/T/0MT#'(+/1!/1(+#2&(/'1.\$B; 'P1(fJ@@@\$-+#/'0 HbN@@?MHbN@@Y\$

E2(/' 12, %&/+1&+ \*' P102(/' 1 (#2C+, 272#0 (' 2((+10 9) 9BV &' 18+#+1&+ /1 34' 10 \*#21&+\$ eP,4 AHHH\$

 $E2(l' 12,!\% + 18 + !*' P102(l' 10!^R) T#' > #2; $ ]/(,+$ <math>V'$ ,+&P,2# "412; /&. %/; P,2(l' 1. '83/T/0 5/,24+# V+; =#21+.\$ B; 'P1(\$ fAKJ0FAY\$ -+#/' O\$ KbAHHYMKbN@@A\$

\*' ' O 210 " #P> BO; /1/. (#2(/' 10 Z88/&+ ' 8 \2&&/1+ ^+. +2#&: [ ^+C/+7\$ ]/(,+\$ 9'; TP(+# V' O+,,/1> ' 8 \2#/&+,,2 I&: /&a+1 T' UL\$ B; ' P1(\$ fAH0GJY\$ -+#/' O\$ AHHG\$

#### ; 96&0!!5673> 3&&5>534567!

B; +#/&21 9: +; /&2, %' &/+(4 V/07+.(B..' &/2(/' 1' 8 9: +; /.(#4]+2&: +#. 2(3/=+#2, B#(. 9',,+>+. 9' P1&/, ' 1 R10+#>#20P2(+ ^+.+2#&: 5/' T: 4./&2, %' &/+(4

#### : 96&0!!5673>!09.5+0

^+C/+7+# 8′ #\$! "#\$%&′"()\* ,#-./)\*!0,#-./)\* #0 1%23"()\* 4%&′"('!1,#-./)\* #0 4%&′"()\* 1%23"'5.&0! ,#-./)\* #0 5%2 632."() / 1%23"()\* 7#("25&0!4%&′"()\* 1%23"'5.& 1%23"()\* 4%&′"('!1,#-./)\* #0 8#\*2(-\*).! "#\*#9&0!,#-./)\* #0 1#3\$-5)5"#/)\* 4%&′"('!1.)/93-".!1.%23"'5.&)/; 4%&′"('#0 :"\$"; '!1.-../\*\* #0 1%23"()\* =%2#.&)/; 1#3\$-5)5"#/> ! "#(%"3"()! "#\$%&′"() 6(5)?>,#-./)\* #0 823@.)/2! "#\*#9&0!,#-./)\* #0 1#3\$-5)5"#/)\* 1%23"'5.&0!4.#(22; "/9' #0 5%2 A)5"#/)\* 6(); 23"2' #0 7("2/(20!! 818! "#\$%&′"('>! "#(%23"'5.&>4:C70 210 ,#-./)\* #0 1%23"()\*<; -()5"#/\$

^+C/+7 T21+, ; +; =+#\$ V', +&P,2# 5/' T: 4./&. .+&(/' 1 E2(/' 12, %&/+1&+ \*' P102(/' 11 9' P#.+0 9P##/&P,P; 0 210 32=' #2(' #4 0; T#' C+; +1( .+&(/' 1 E2(/' 12, %&/+1&+ \*' P102(/' 11 "+T2#(; +1(! '8) 1+#>4I Z: /' %PT+#&'; TP(+# 9+1(+#!!V+; =#21+ 5/' &: +; /. (#4 [ 5/' T: 4./&. .+&(/' 1 E2(/' 12,!01. (/(P(+.!' 8!6+2,(: !!E2(/' 12, ^+.+2#&: 9' P1&/, B1(' 1 2,,' &2(/' 1 T21+,\$!

h+4P 3P \_ -: "Q!VD]
e2; +. d'#; 21 \_ -: "QR1/C+#./(4'8 V/&:/>21
5' <21> \_ -: "Q'2,+ R1/C+#./(4
%: +1>.: P21> h: P!\_ -: "QE'#(: 7+.(+#1 R1/C+#./(4
3P 6'1> \_ -: ".(P0+1(Q!R1/C+#./(4'89:/&2>'^421 %140+# \_ -: ".(P0+1(QD10/212 R1/C+#./(4
^/(: 46+1> \_/10P.(#/2,!&:+; /.(
B10#+7 -P+1(+ \_ -: ".(P0+1(Q\210+#=/,(R1/C+#./(4

### 57.5401;90!07434567!

 $n\2\#/2(/'\ 12,\ \%'\ ,P(/'\ 1.\ ('\ D1(+>\#2,\ )\ i\ P2(/'\ 1\ ]:\ +'\ \#/+.\ '\ 8\ (:\ +\ ), +\&(\#/\&2,\ ''\ '\ P=,+\ 324+\#nQ\ AHHF\ E2(/'\ 12,!B9\%!;\ ++(/1>0!<2.:/1>('\ 1!''\ 9\$)$ 

n%P#82&+ ]+1./' 1MB#+2!D.' (: +#; ..' 8 2!" --9 5/,24+# 210 V' 1' ,24+# 8#' ; !V' ,+&P,2# " 412; /&. 9' ; TP(+# %/; P,2(/' 1.nQ AHHK E2(/' 12, B9%!; ++(/1>Q 9: /&2>' D3\$

n]/; + &2,+. '83/T/0 "412; /&.n0 AHHJ d' #0' 1 9' 18+#+1&+ ' 1 9: +; /. (#4 2( D1(+#82&+.0 V+#/0+1 E6\$

n5P/,0/1> 2 %PT+#&'; TP(+# 8' # 9');  $TP(2(/'12, 9: +; /.(\#4n0 AHHH 9'1.' \#(/P; '83/=+\#2, B\#(.9', +>+. 193B9L 211P2, ; ++(/1>0^++0 9', +>+$)$ 

n3/T/0 "412; /&. 8#'; %/; P,2(/' 1 210 )UT+#/; +1(n0 N@@@ \*B%)5; ++(/1> ' 1; +; =#21+ =/' T: 4./&.0 %2U' 1k. ^/C+# \]\$

oV',+&P,2# "412; /&. %/; P,2(/'1. '8 %2(P#2(+0 210 -',4P1.2(P#2(+0 3/T/0 5/,24+# V+; =#21+.p0 N@@N D1(+#12(/'12, %' &/+(4 8' # (: + %(P04 '8 \*2((4 B&/0. 210 3/T/0.0 V'1(#+2,921202\$

o-',4P1.2(P#2(+0 3/T/0 5/,24+# V+; =#21+.\$D1./>: (. 8#'; V',+&P,2# "412; /&. 9'; TP(+# %/; P,2(/' 1.p0 N@@? R1/C+#./(4'8 V/&:/>21 V+; =#21+ 5/' T: 4./&. %4; T'./P; \$

```
oD1./>: (. /1(' -',4P1.2(P#2(+0 3/T/0. 8#'; V',+&P,2# "412; /&. %/; P,2(/' 1.pQ N@@F 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>$
```

```
oR10+#. (210/1> (: +!P1/i P+!T#' T+#(/+. ' 8 T' ,4P1.2(P#2(+0 ,/T/0.p0 5/' ,' >/&2, \bigvee+; =#21+.$ ); +#>/1> 9: 2,,+1>+. 2( (: + D1(+#82&+ =+(7++1]: +' #40 9'; TP(+# %/; P,2(/' 10 210) UT+#/; +1(0 %P1 \2,,+4 DO2: '0 N@@F$
```

oV',+&P,2# "412; /&. %/; P,2(/'1. '8 %2(P#2(+0 210 - ',4P1.2(P#2(+0 3/T/0 5/,24+# V+; =#21+.p0 V',+&P,2# D1(+#82&+ %4; T'./P; 0 Z.2a20 e2T21 N@@F\$

oR10+#. (210/1> (: + P1/i P+ T#' T+#(/+. '8!T', 4P1.2(P#2(+0!,/T/0.p0  $\vee$ /07+. (9'; TP(2(/'12, %(#P&(P#2, 5/', '>4 < ' $^{\prime}$ a.: 'T0 BP>P. (2! $\vee$ 00 N@@K\$

o]: +!P1/i P+!T#' T+#(/+. '8 T',4P1.2(P#2(+0,/T/0.p05/','>/&2, V+; =#21+.\$%(#P&(P#+!210 \*P1&(/' 10 Z: /' 9+1(+#8'#]+&: 1','>4 210 %&/+1&+09',P; =P. Z60 N@@K\$

 $0^{\prime}$ ,+. 8' #'; +>2M?!82((4 2&/0. /1 (: +8P1&(/' 1 '8; +; =#21+ T#' (+/1.pQ N@@J B11P2, V++(/1>'8 (: +B; +#/&21 9: +; /&2, %' &/+(4Q %21 \*#21./.&' !9B\$

oR1/i P+!T#' T+#(/+. '8 T',4P1.2(P#2(+0,/T/0.210(:+/#/1(+#2&(/'1.7/(:;+;=#21+! T#'(+/1.p0 d'#0'1^+.+2#&:9'18+#+1&+'10'19:211+,.0]/,('1 E6\$

 $0\2,/02(/1>; +; =#21+./; P,2(/'1.(:#'P>: &'; T2#/.'17/(: EV^210 mM#24.&2((+#/1>+UT+#/; +1(.pQ N@@G B11P2, V++(/1>'8(:+B; +#/&219:+; /&2, %' &/+(4Q 9:/&2>' 03$)$ 

oD1(+#2&(/' 1. ' 8'; +>2M?!82((4 2&/O. 7/(: #: ' O' T./1pQ N@@G R1/C+#./(4' 8" +,272#+ V+; =#21+ -#' (+/1 %4; T' ./P; Q E+72#a!")

o-#' T+#(/+. ' 8 ,/T/O. &' 1(2/1/1> O' &' .2: +U2+1' /& 2&/O 210 (: +/# /1(+#2&(/' 1. 7/(: (: +!/1(+>#2, +; =#21+ T#' (+/1 #: ' O' T./1p0 N@@Y D1(+#12(/' 12, %' &/+(4 8' # (: + %(PO4 ' 8 \*2((4 B&/O. 210 3/T/O.0 j 21.2. 9/(4  $\bigvee$ Z\$

D1 +1'/& .9 (1:3+11)Tf97.2 [T21(02T9)TCF3219T73.2 0 Td [(0.9J/T1\_0 1 Tf ]TJ/T)]TJ/8 .&]TJ f 2.3

oB  $^+/1(+^{\dagger}T^{\dagger}+(2()'\ 1'\ 8\ E+P(\ '1\ \%2((+^{\dagger}/1>)\ UT+^{\dagger}/;\ +1(.\ '1\ 2\ 3/T/02(+0\ ^2.\ -+T(/0+\ R./1>^+T,/\&2)\ U\&:\ 21>+\ V'\ ,+&P,2^{\sharp}\ ''\ 412;\ /\&.\ p\ N@AA\ %1'\ 7;\ 2..\ \&'\ 18+^{\sharp}+1&+\ '1\ ;\ +;\ =^{\sharp}21+.\ 210$  ; +; = $^{\sharp}21+\ T''$  (+/1. $^{\$}$ 

o)88+&('8,/T/OP1.2(P#2(/'1'1,/T/OMT#'(+/1!/1(+#2&(/'1.pN@A?%1'7; 2..&'18+#+1&+'1; +; =#21+.210; +; =#21+ T#'(+/1.\$

oVP./1>. 2( VD''M92#++#S < : 2(/...' %T+&/2, 2='P('; +>2M?!\*2((4 B&/0.qp N@AK!B11P2, V++(/1>'8 (: +5/'T: 4./&2,M%' &/+(40 52,(/; '#+0 V'')))))))))

o9' 18' #; 2(/' 1 ' 8 #+(/12, &' 1(#' ,. (: + Tj 2 ' 8 T#' (' 12(+0 %&: /88 =2. + 0P#/1> #: ' 0' T./1 2&(/C2(/' 1p N@AK B9%!B11P2, ; ++(/1>0 " +1C+# 9Z

# @66A!

1#3\$-5)5"#/)\*8#; 2\*"/9 #0 823@.)/2!"\*)&2.'?)0/(+0 = 4 %)\$ \*+,,+#\$),.+C/+#\$ N@@Y\$

; 6! 409; 90! 07434567! 371 +67495@2401 43>A! BCD' E#\$' F \*ED')G)/D\*/\$' "#H/\*\$I #)FJ "\$ 6P. (+#Q %\$)\$ \*+,,+# 210 j \$ d27#/. &: Q nEZ)%' EV^ 9#' .. T+2a. 5+(7++1 3/T/0 6+20>#' PT. 210 640#' &2#=' 1 9: 2/1.\$ %T/1 "/88P./' 1 ' # V' ,+&P,2# "/.' #0+#qnQ AHHH 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>Q 52,(/; ' #+ V"\$

9\$B 5#' 71g 210 %\$)\$ \*+,,+#0 nV' ,+&P,2# " 412; /&. %/; P,2(/' 1. ' 8 )(: 21' , /1 2 3/T/0 5/,24+#n0 N@@@ B; +#/&21 9: +; /&2, %' &/+(4 \_ D10/212T' ,/. .+&(/' 1 T' .(+# .+../' 1\$!

 $j \ d27\#/. \&: 0\%) \ ^*+,,+\#0 \ E\$\backslash\$ \ ),0: '0210 \ B\$V\$ \%28,+40 \ n9' \ 18' \#; \ 2(/'1210 \ ^*,+U/=/,/(4'8(:+-',4P1.2(P\#2(+0'''8'.2:+U2+1'/8 B\&/09:2/1n0 N@@A!5/'T:4./&2, %'&/+(4 B11P2, V++(/1>05'.('1 VB\$)$ 

"\$]\$ E/cc20 9: #/. (' T: +# B\$ 5#' 71g0 %\$)\$ \*+,,+#0 210 j \$ d27#/. &: 0 nEV^ V+2. P#+; +1(. 210 V" %/; P,2(/' 1. '8)(: 21',M; +; =#21+ D1(+#2&(/' 1. n0 N@@A 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 5'. (' 1 VB\$

9\$B 5#' 71g 210 %\$)\$ \*+,,+#Q nV',+&P,2# "412; /&. %/; P,2(/'1. '8)(:21',/123/T/05/,24+#nQ N@@A E2(/'12,9'18+#+1&+'1R10+#>#20P2(+^+.+2#&:Q3+U/1>('1j'\$

%\$) \$ \*+,,+#0 ^\$\*\$ " 2,,/1>+#0 210 -\$9\$ V&j /11+40 oD1(+>#2(/1> V',+&P,2# V' O+,/1> D1(' (: + d+1+#2, 9: +; /. (#4!9' P#.+p0 N@@A E2(/' 12, B9% 82,,; ++(/1>0 9: /&2>' D3\$

"\$^\$ 92#,g 210 %\$)\$ \*+,,+#0 oV',+&P,2# 0412; /&. ./; P,2(/' 1. ' 8 ,/i P/Ob,/i P/O /1(+#82&+.\$ B1 /1 O+T(: !,' ' a 2(  $72(+#b' \&(21+p0 N@@A!B; +#/\&21 9: +; /\&2, \%' \&/+(4 _ D1O/212T',/. .+&(/' 1 T'.(+#..+../' 1$)$ 

B\$ V'.+#g 210!%)\$ \*+,,+#Q oV',+&P,2# V'O+,/1>'8 3/T/O 5/,24+# V+; =#21+.pQ N@@A!B; +#/&21 9:+; /&2, %' &/+(4!\_D10/212T',/..+&(/'1 T'.(+#.+../'1\$

V\$3\$ %(#20+#g 210 %\$)\$ \*+,,+#Q oB!\*,+U/=,+ B,,M2(';!\sumsymbol{V}'O+, '8"/; +(:4,.P,8' U/O+ 8' #\sumsymbol{V}',+&P,2#" 412; /&. %/; P,2(/'1.pQ N@@A B; +#/&21 9:+; /&2, %' &/+(4\_D10/212T',/..+&(/'1 T'.(+#.+../'1

B\$ 5+.+,; 210 %\$)\$ \* +,, +#0 210 B\$"\$ V2&j +#+,, e#0 oWP21(P; !; +&: 21/&2, . (P04 ' 8 (: + /1 (#/1./& +1+#>+(/&. ' 8 (: +!>,4&+#' , T: ' .T: ' (+1/4=+#) 1 ' 8 T: ' .T: ' ,/T/0. p0 N@@N 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0.5'). (' 1 VB\$

"\$^\$ 92#,g 210 %\$)\$ \*+,,+#0 o92,&P,2(/1> \*#++ )1+#>/+. '8 ]#21.8+##/1> 2 %/1>,+ < 2(+# \( \nabla ', +\& \)+&P,+ ]: #' P>: 5P,a 324+#. '8 %/U(++1\)92#='1 9: 2/1.\$ B %(PO4 '8 \( \nabla 1\)8#+2./1> 3+C+,. '8 \( \nabla 1\)2(P#2(/' 1 /1 6+U2O+&21+ \( \nabla ', +\& \nabla P, +\) | N@@N B; +#/&21 9: +; /&2, %' &/+(4 \( \nabla 10/212T' ,/. . +\& (/' 1 T' . (+# .+ . . /' 1\)!

e\$"\$ %&21,' 1g 210 %\$)\$ \*+,,+#0 oV',+&P,2# "412; /&. %/; P,2(/' 1. '86P; 12!EM^B% -#' (+/1 /1 2 "/; 4#/.('4,T:'.T:2(/04,&:',/1+I" V-9L=/,24+#p0 N@@N B; +#/&21 9:+; /&2, %' &/+(4\_ 010/212T',/...+&(/' 1 T'.(+#.+../' 1\$

%\$)\$ \*+,,+# 210 ]\$5\$ < ' ',80 o-',4P1.2(P#2(/' 1 )88+&(. ' 1 -#' (+/1\$3/T/0 D1(+#2&(/' 1.5 \nabla',+&P,2# "412; /&. %/; P,2(/' 1. ' 8 ^: ' 0' T./1 /1 21 )UT,/&/(!" 6B!5/,24+#p0 N@@?!5/' T: 4./&2, %' &/+(4 B11P2, \nabla++(/1>0 %21 B1(' 1/' ]m\$

```
E$\$!),0:'0!\$\$!*+,,+#0!\$!]#/.(#2; ME2>,+0 D$\$-','c'C0j$d27#/.&:0o-',4P1.2(P#2(+O"'&'.2:+U2+1'/&C.$"'&'.2T+1(2+1'/&B&/O_"'/88+#+1&+./13/T/OV2(#/U-#'T+#(/+.8#'; (:+3'...'8Z1+"'P=,+5'10p0 N@@?5/'T:4./&2,%'&/+(4B11P2,V++(/1>0%21B1('1/']m$
```

"\$^\$ 92#,g 210 %\$)\$ \*+,,+#0 092,&P,2(/1> \*#++ )1+#>/+. '8 ]#21.8+##/1> 2 %/1>,+ < 2(+#  $\lor$ ' ,+&P,+]: #' P>: 5P,a 324+#. '8 %/U(++1M92#=' 1 9: 2/1.\$ B %(P04 '8 D1&#+2./1> 3+C+,. '8 R1.2(P#2(/' 1 /1 6+U20+&21+  $\lor$ ' ,+&P,+.p0 E2(/' 12, 9' 18+#+1&+ 8' # R10+#>#20P2(+ ^+.+2#&: 0 %2,( 32a+ 9/(4 R]\$

e\$ "P.(; 21g 210 %\$)\$ \*+,,+#Q oB 9'; TP(2(/' 12, %(PO4 ' 8 \/.&' ./(4 /1 (: + 3/T/O 5/,24+#pQ N@@? B; +#/&21 9: +; /&2, %' &/+(4 D1O/212T',/...+&(/' 1 T'.(+# .+../' 1\$

 $e\$ < 2\#0g \ 210 \ \$\$)\$ *+,,+\#0 \ o]: + )88+\&(. '8]\#21.M*2((4 B\&/0. '1 3/T/0 V+; =\#21+.p0 N@@? B; +\#/&21 9: +; /&2, %' &/+(4!_ D10/212T', /. . +&(/'1 T'. (+# .+../'1$)$ 

%\$-\$%' 1/0 e\$ < 2#0g0!%\$)\$ \*+,,+#0!%\$^\$ < 2..2,,0!0 V',+&P,2# Z#>21/c2(/' 1 /1 2 ]#21. R1.2(P#2(+0 V+; =#21+p0 N@@F 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0.52,(/; '#+V'')\$

e\$ "P.(; 21gl 6\$9\$ d2+0+lj\$ d27#/.&: 0 %\$)\$ \*+,,+#llol1(+#2&(/' 1 ' 8 2 %+#/+. ' 8 B#'; 2(/& %',P(+. 7/(: 2 -: '.T: ',/T/0 5/,24+#pl N@@F 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 52,(/; ' #+ V"\$

'\$ 3/P0 E\$ j P&+#a20 E\$ 9: P0 %\$ ]#/. (#2; ME2>,+0!6\$\\]!-+(#2\&: +0 \\\\$)\\!\*+,,+#0 \\ext{c}\\*\\\$!E2>,+0!0\(\(\text{#P&(P#+ 210 D1(+#2\&(/' 1. ' 8 5/' ; +; =#21+. R./1> ''/88P. + m\\\#24 \\&2((+\\#/1> ' 1 \*P,,4 640\\#2(+0 Z\\#/+1(+0 \\\4.(+; . p0 N\\@F 5/' T: 4./\&2, \\' \&/+(4 B11P2, \nabla ++(/1>0 52,(/; '\\#+!\nabla '')\\\$

%\$)\$ \*+,,+#Q \\$9\$ -/(; 210!0B!\V',+&P,2# "412; /&. %(PO4'8!(:+D1(+#2&(/'1!'89:',+.(+#',7/(:!%2(P#2(+0210-',4P1.2(P#2(+0\*2((4B&/0./12-:'.T:2(/04,&:',/1+3/T/05/,24+#pQN@@F5/'T:4./&2,%'&/+(4B11P2,\V++(/1>Q52,(/; '#+\V''\$

%\$-\$%' 1/0 e\$ < 2#0g0 %\$)\$ \*+,,+#0 %\$^\$ < 2..2,,0 oV',+&P,2# Z#>21/c2(/' 1 /1 2!]#21. R1.2(P#2(+0 V+; =#21+p0 N@@F 9+1(#2, ^+>/' 12, V++(/1> ' 8 (: + B; +#/&21 9: +; /&2, %' &/+(4\$

%\$)\$ \*+,,+#Q  $\vee$ \$9\$ -/(; 21Q oB! $\vee$ ',+&P,2# "412; /&. %(PO4 '8 (: + D1(+#2&(/' 1 '8 9: ',+. (+#' , 7/(: %2(P#2(+O 21O -' ,4P1.2(P#2(+O \*2((4 B&/O. /1 2 -: '.T: 2(/O4,&: ',/1+ 3/T/O 5/,24+#pQ N@@F 5/' T: 4./&2, "/.&P../' 1.; ++(/1>Q B./,'; 2#Q 9B\$

%\$)\$ \*+,,+#Q  $\vee$ \$9\$ -/(; 21Q \*\$ %P/(.Q oB! $\vee$ ',+&P,2# " 412; /&. %(PO4 ' 8 (: + D1(+#2&(/' 1 ' 8 9: ',+.(+#', 7/(: %2(P#2(+0 210 - ',4P1.2(P#2(+0 \*2((4 B&/0. /1 2 -: '.T: 2(/O4,&: ',/1+ 3/T/O 5/,24+#pQ N@@K 5/' T: 4./&2, %' &/+(4 B11P2,  $\vee$ ++(/1>Q 3' 1> 5+2&: 9B\$

B\$ d#' . .8/+,00  $\lor$ \$9\$ -/(; 210 \*\$ %P/(.0 %\$)\$ \*+,,+#0 o  $\lor$ ' ,+&P,2# " 412; /&. D1C+. (/>2(/' 1 ' 8 " 2#aM B02T(+0 ^: ' 0' T./1 /1 21 +UT,/&/( N\$N\$A %" -) b%" -9b9: ' ,+. (+#' , ) 1C/#' 1; +1(\$ -#' (+/1 %(#P&(P#+ 210 " 412; /&. p0 N@@K 5/' T: 4./&2, %' &/+(4 B11P2,  $\lor$ ++(/1>0 3' 1> 5+2&: 9B\$

V\$ 92##/,,' M]#/TT0 %\$)\$ \*+,,+#0 o32(+#2, -#+..P#+ "/.(#/=P(/' 1 ' 8 V' 1' 210 -',4P1.2(P#2(+0 B&/0 9' 1(2/1/1> 3/T/0 V+; =#21+.p0 N@@K 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 3' 1> 5+2&: 9B\$

%\$)\$ \*+,,+#Q B\$ \' >+,Q 6\$ < 2,O; 211Q j \$ B#1',OQ!"\$ 6P. (+#Q!OV',+&P,2#"412; /&. %/; P,2(/' 1 ' 8 2 3/T/O2(+O ^2. -+T(/O+/1 V+; =#21+.pQ N@@K 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>Q 3' 1> 5+2&: 9B\$

B\$ \' >+,0 9\$-\$ j 2(ca20 6\$ < 2,0; 2110 j \$ B#1',00 %\$)\$ \*+,,+#0 \\\$\*\$ 5#' 710 "\$ 6P. (+#0 o" 412; /&. ' 8 2 3/T/0M\\' 0/8/+0 ^2. -+T(/0+/1 \\+; =#21+. \\D1C+. (/>2(+0 =4 \\6!8', \/0M\\(2(+ \)E\\^^++,2U2(/' 1 210 \\' ,+&P,2# " 412; /&. %'; P,2(/' 1p0 \\0@\\J5/' T: 4./\&2, %' \\&/+(4 \B11P2, \\+/++(/1>0 \\2,(32a+9/(4 \R1\)\$

%\$)\$ \*+,,+#0  $\lor$ \$B\$  $\lor$ &92=+0 ^\$ B0,′ 80 %\$^\$ < 2..2,,0 o" ′ P=,+ 5′ 10 3′ &2(/′ 1 " +(+#; /1+.  $\lor$  ′ ,+&P,2# B#+2 210 32(+#2, ]+1./′ 1\$ %′ ,/0 %(2(+  $^{N}6$ !E $\lor$ ^!210  $\lor$  " %/; P,2(/′ 1. ′ 8 -′ ./(/′ 12, 0. ′; +#. ′ 8 2  $\lor$  1′ P1.2(P#2(+0 -: ′ .T: ′ ,/T/0  $\lor$ +; =#21+p0 N@@J 5/′ T: 4./&2, %′ &/+(4 B11P2,  $\lor$ ++(/1>0 %2,( 32a+ 9/(4 R]\$

B\$ d#'..8/+,00 %\$)\$ \*+,,+#0 V\$9\$ -/(; 210 oB!#',+8' # 0/#+&(/1(+#2&(/' 1. /1 (: +; ' OP,2(/' 1 ' 8 #: ' O' T./1 =4 '; +>2M?!T',4P1.2(P#2(+O ,/T/O.p0 N@@J!5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 %2,( 32a+ 9/(4 R]\$

 $-\$<\$ 32P0 \lor\$9\$ -/(; 210 \%)\$*+,,+#0 \lor\$*\$ 5\#' 710 09' 18' \#; 2(/' 12, \%+1./(/C/(4' 8 ^+(/14,/0+1+9' 82&(' #/1 ^: ' 0' T./1 \%(P0/+0 = 4!V' ,+&P,2# " 412; /&.p0 N@@J 5/' T: 4./&2, %' &/+(4!B11P2, V++(/1>0 %2,( 32a+9/(4 R]$$ 

j\$d27#/.&: Q!Z\$%'P=/2.Q!E\$\\$),O:'Q!<\$)\$]+2>P+Q!210%\$)\$\*+,,+#Q!0%(#P&(P#+ 210 0412; /&. '8 T',4P1.2(P#2(+0!: 40#' &2#=' 1!&: 2/1. /1!,/T/0!=/,24+#. 210!(: +/# /1(+#2&(/' 1!7/(: !dMT#' (+/1! &' PT,+0; +; =#21+ #+&+T(' #.pQ N@@J B; +#/&21 9: +; /&2,%' &/+(4 B11P2, V++(/1>Q%21 \*#21./.&' 9P\$

%\$)\$  $*+,,+#0!0\2,/02(/1>; +; =#21+./; P,2(/'1. (: #'P>: &'; T2#/.'17/(: EV^210 mM#24. &2((+#/1>!+UT+#/; +1(.p0 N@@G B; +#/&21 9: +; /&2, %' &/+(4 B11P2, V++(/1>0 9: /&2>' D3$$ 

B\$ d#' ..8/+,00 V\$9\$ -/(; 210 %\$)\$ \*+,,+#0 Z\$ %' P=/2.0 j \$ d27#/.&:0o]: + #' ,+ ' 8 72(+# /1 #: ' 0' T./1 2&(/C2(/' 1\$ D1./>: (. 8#' ; !(7' ; /&#' .+&' 10M. &2,+ ; ' ,+&P,2# 0412; /&.!./; P,2(/' 1.p N@@G 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 52,(/; ' #+ V"\$

B\$ d#' ..8/+,00 %\$)\$ \*+,,+#0  $\vee$ \$9\$ -/(; 210 o9' 1C+#>+1&+ '8; ',+&P,2# 0412; /&. ./; P,2(/' 1. '8; +; =#21+ T#' (+/1.p N@@G 5/' T: 4./&2, %' &/+(4 B11P2,  $\vee$ ++(/1>0 52,(/; '#+  $\vee$ "\$

 $B\$ \ ' > +, \emptyset \ d\$ ^+ P(: +\#\emptyset j \$] \$ \ ] 210 6\$ < 2,0; \ 2110 e\$ j \ P: \ ; \ 2110 j\$ B\#1' \ ,00 \%) \$ ^* +, \ _+\#\emptyset \ V\$^*\$ 5\#' 710 "\$ 6P. (+\#\emptyset 0" 412; \ /\&. ' 8 (: + 3/T/0MV' 0/8/+0 V+; =#21+ B1&: ' # ' 8 6P; \ 21 EM^2. \ D1C+. (/>2(+0 =4 N6! \%' ,/0M%(2(+ EV^^ +,2U2(/' 1 210 V' ,+&P,2# "412; \ /\&. \%/; P,2(/' 1.p N@@G 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 52,(/; ' #+ V" $$ 

%\$-\$ %' 1/0!e\$ ^P14210!e\$B\$ < 2#0g0!%\$)\$ %+10!%\$)\$ \*+,,+#0!%\$^\$ < 2..2,,0!o=.) /' C.\$!1"' R1.2(P#2(/' 1\$ ]: + )88+&(. ' 1 V' ,+&P,2# Z#>21/c2(/' 1 /1 2 -: ' .T: ' ,/T/0 V+; =#21+ %(P0/+0 =4 %' ,/0 %(2(+  $^{N}6$ ! EV^!%T+&(#' .&' T4!210!V" !%/; P,2(/' 1.p N@@G!5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 52,(/; ' #+ V"\$

%\$ ]#/. (#2; ME2>,+0 e\$E\$ %2&: .0 E\$ j P&+#a20 %\$)\$ \*+,,+#0 e\$\*\$!E2>,+0 o%(#2(+>4 8' # %(#P&(P#+ "+(+#; /12(/' 1 ' 8 3/T/Ob9: ' ,+. (+#' , 5/,24+#.p N@@G 5/' T: 4./&2, %' &/+(4 B11P2,  $\nabla$ ++(/1>0 52,(/; ' #+  $\nabla$ "\$

 $-\$<\$ 32P0 B\$ d\#' ...\$/+,00\%\$)\$ ^*+,,+#0 V\$9\$ -/(; 210 V\$^*\$ 5\#' 710 o^+(/12, *,+U/=/,/(4 ' 8 ^: ' 0 ' T./1 D,,P; /12(+0 ]: #' P>: 32\#>+W&2,+ V' ,+&P,2# "412; /&. %/; P,2(/' 1.p N@@G!5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 52,(/; ' #+ V'' $$ 

 $j \ V2\#(r1+cMV24'\ \#>20\ V\$9\$-/(;\ 210\ B\$\ d\#'\ ...8/+,00\%)\$^*+,,+\#0\ V\$^*\$5\#'\ 710\ o\ V.P2,^+&+T('\ \#B\&(/C2(/'\ 1\ )C2,P2(+0=4\ V'\ ,+&P,2\#''\ 412;\ /\&.\ \%/;\ P,2(/'\ 1\ ..210\ \%'\ ,/0\ \%(2(+\ ^6!EV^!\%T+\&(\#'\ .\&'\ T4pN@G\ 5/'\ T:\ 4./\&2,\%'\ \&/+(4\ B11P2,\ V++(/1>0\ 52,(/;\ '\ \#+\ V''\$)$ 

 $B\$ \ ' > +,0 "\$ 6P. (+\#0 B\$ \ \%(\#P(.0 \%)\$ * +,,+\#0 210 \ V\$ *\$ 5\#' 710!03/T/0 5/,24+\# "412; /\&. D1C+. (/>2(+0 49'; =/1+0!%',/OM%(2(+ EV^ ^+,2U2(/' 1 210 \ V',+&P,2# "412; /&. %/; P,2(/' 1.p!N@@Y! 5/' T: 4./&2, %' &/+(4 B11P2, \ V++(/1>0 3' 1> 5+2&: 9B$$ 

B\$ d#' ..8/+,00 %\$)\$ \*+,,+#0 210 V\$9\$ -/(; 210!0%T+&/8/&/(4 Z8 B1(/; /&#' =/2, 3/T' T+T(/0+. \*' # 52&(+#/2, V+; =#21+.\$\D1./>: (. \*#'; V',+&P,2# "412; /\&. %/; P,2(/' 1.p!\\@@\Y 5/' T: 4./\&2, \%' \&/+(4 B11P2, V++(/1>\O3' 1> 5+2\&: 9B\\$

B\$ \' >+,0 ]\$ %&: #s0+#0 j\$ \$]\$ ]210 9\$ 321>+0 6\$ < 2,0; 2110 %\$)\$ \*+,,+#0 \\\$\*\$ 5#' 710 210 "\$ 6P. (+#0! o%(#P&(P#+ 210 " 412; /&. ' 8 (: + B&4, 9: 2/1 ' 8 3/T/0 \\' ' 0/8/+0 \\+; =#21+-#' (+/1. %(P0/+0 =4 \\6! %' ,/0M\(2(+ E\\^2 210 \\'' \\%'; P,2(/' 1p!Ne@Y 5/' T: 4./&2, \\' &/+(4 B11P2, \\++(/1>0 3' 1> 5+2&: 9B\$)

 $-\$ <\$ 32P0 B\$ d\#' ... 8/+,00 \%\$)\$ *+,,+#0 j\$ V2\#(r1+cMV24' \#>20 B\$\S \%(\#P(.0 V\$9\$ -/(; 210 210 V\$*\$ 5\#' 710!0V',+&P,2# "412; /&. \%/; P,2(/' 1. R1C+/, "412; /& *,+U/=/,/(4 ' 8 ^+ (/12, 7/(: /1 5/10/1> -' &a+( ' 8 ^: ' 0' T./1p N@@Y 5/' T: 4./&2, \%' &/+(4 B11P2, V++(/1>0 3' 1> 5+2&: 9B$$ 

%\$-\$%' 1/0 e\$ ^P14210 d\$ 5/#&: 0 e\$B\$ < 2#0g0!%\$)\$ %+10!%\$)\$ \*+,,+#0!210 %\$^\$ < 2..2,,0!o \( \frac{1}{2} \) \( \frac{1}

%\$ \*+,,+#0  $\lor$ \$ ^' 2#a0 -\$ ]P; 21+10 210 6\$3\$ %&' ((0!o%/; P,2(/' 1 %(PO/+. Z8 ]: + -#' T+#(/+. Z8 640#2(+0 -Z-9 3/T/0 5/,24+#. D1(+#2&(/1> </(: B E21' T' #' P. %' ,/0 %/,/&2 %P=. (#2(+p N@@Y 5/' T: 4./&2, %' &/+(4 B11P2,  $\lor$ ++(/1>0 3' 1> 5+2&: 9B\$

E\$ j P&+#a20 e\$\*\$ E2>,+0 e\$ %2&: .0 %\$)\$ \*+,,+#0 e\$ -+1&+#0 B\$ e2&a.' 10 210!e\$ j 2(.2#2.0!o3/T/O B#+2 ^+8/1+; +1(52.+0 Z1 B!%/; P,(21+' P. B12,4./. Z8 E+P(#' 1 B10 mM#24 %&2((+#/1> "2(2 B10 B,,M 2('; V',+&P,2# "412; /&. %/; P,2(/' 1.p N@@Y 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 3' 1> 5+2&: 9B\$

B\$ \ ' >+,0 \ \\$\*\$ 5#' 710 \%\$)\$ \*+,,+#0 06+20>#' PT!9' 18' #; 2(/' 1. ' 8 -: ' .T: ' ,/T/0. 8#' ; \ \ ' ,+&P,2# " 412; /&. \%'; P,2(/' 1\$ \%2; T,/1> 9: 2,,+1>+. 210 9' ; T2#/.' 1 (' )UT+#/; +1(p N@@H 5/' T: 4./&2, \%' \&/+(4 B11P2, \ \++(/1>0.5' . (' 1 \ \B\$)

B\$ \' >+,0 B\$ d#' . .8/+,00 \\\$9\$ -/(; 210 \%)\\$ \*+,,+#0 \\\$\*\\$ 5#' 710 o3/T/OM-#' (+/1 D1(+#2&(/' 1 . ' 8 ^: ' O' T ./1 D1C+ . (/>2(+O = 4 \\ ' ,+&P,2# " 412; /& . \%/; P,2(/' 1 . p N@@H!5/' T : 4 ./&2 , \%' &/+(4 B11P2 , \\ \++(/1>0 5' . (' 1 \\ B\$)

%\$-\$%' 1/0 e\$ ^P14210 d\$ 5/#&: 0 e\$B\$ < 2#00 %\$)\$ %+10 %\$)\$!\*+,,+#0 %\$^\$! < 2..2,,0 o]: + )88+&( '8 = .) /' R1.2(P#2(/' 1 ' 1  $\lor$  ',+&P,2# Z#>21/c2(/' 1 /1 2 -: '.T: ',/T/0  $\lor$ +; =#21+p N@@H!5/' T: 4./&2, %' &/+(4 B11P2,  $\lor$ ++(/1>0 5' .(' 1  $\lor$ B\$

5\$ V+#(c0 %\$)\$ \*+,,+#0 V\$\*\$ 5#' 710 o9';  $TP(2(/'12, D1./>: (./1('^+(/12, "412; /&./1^: '0'T./1p N@A@ 5/'T: 4./&2, %' &/+(4 B11P2, <math>V$ ++(/1>0 %21 \*#21./.&'!9B\$

%\$)\$ \*+,,+# oR1/i P+,/T/OMT#' (+/1!/1(+#2&(/' 1. ' = . +#C+#+0 /1 ; ' ,+&P,2# 0412; /&. ./; P,2(/' 1. ' 8 #: ' O' T./1 /1 2 T' ,4P1.2(P#2(+0 ; +; =#21+p N@A@ B; +#/&21 %' &/+(4 8' #!5/' &: +; /. (#4 210 \\ \\ \\ \' ,+&P,2# 5/' ,' >4 B11P2, \\ \\ \\ \+(/1>0 B12: +/; 9B\$

%\$)\$ \*+,,+# 06+,/UM: +,/U /1(+#2&(/' 1. /1!T: ' .T: ' ,/T/0!=/,24+#. 2. 2 8P1&(/' 1!' 8!2&4, &: 2/1 P1.2(P#2(/' 1p N@AA B9% B11P2, V++(/1>0 B12: +/; 9B\$

e\$ d'#; 210 %\$)\$ \*+,,+# oB!9'; T2#2(/C+ \forall ',+&P,2# "412; /&. %(PO4'8(:+)88+&('8 B,T: 2M]' &' T: +#', 210 9: ',+. (+#', '1 -: '.T: ',/T/0 5/,24+#.: 2C/1> "/88+#+1(3+C+,.'8 B&4, 9: 2/1 R1.2(P#2(/'1p N@AA 5/'T: 4./&2, %' &/+(4!B11P2, \forall ++(/1>0 52,(/; '#+ \forall '#+ \forall ')

% h: Pg0 %\$) \$ \*+,,+# o]: + Tj 2 ' 8 ^+(/12, " +T+10. ' 1 (: + 9' 18' #; 2(/' 1 ' 8 (: + 5+(2M)' 1' 1+ ^/1>p N@AA 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 52,(/; ' #+ V"\$

5\$ \(\nabla\_+\)(c0 \(\nabla\_\*\) 3Pg0!\%\)\\$ \*+,,+\(\nabla\_1\)\\$ 5\(\nabla\_+\)' (1 \(\nabla\_1\)\) 412; \(\lambda\_\*\)' +,,+\(\nabla\_1\)\\$ 5\(\nabla\_+\)' (1 \(\nabla\_1\)\) 18' \(\nabla\_+\)' \(\nabla\_1\)\] 18' \(\nabla\_+\)' (1 \(\nabla\_1\)\) 18' \(\nabla\_+\)' (1 \(\nabla\_1\)\) 18' \(\nabla\_+\)' (1 \(\nabla\_1\)\) 18' \(\nabla\_1\)\] 18' \(\nabla\_+\)' (1 \(\nabla\_1\)\) 18' \(\nabla\_1\)' 18' \(\

5\$ < 21>g0!%\$)\$ \*+,,+# 06+,/UM: +,/U /1(+#2&(/' 1. /1!T: '.T: ',/T/0!=/,24+#. 2. 2 8P1&(/' 1!' 8!2&4, &: 2/1 P1.2(P#2(/' 1p N@AA 5/' T: 4./&2, %' &/+(4 B11P2,  $\nabla$ ++(/1>0 52,(/; '#+  $\nabla$ "\$

%\$)\$ \*+,,+#\ V\$B\$ ^' 2#a\ B\$ \' >+, oB!^+/1(+#T#+(2(/' 1 ' 8 E+P(#' 1 %&2((+#/1> )UT+#/; +1(. ' 1 2! 3/T/02(+0 ^2. -+T(/0+ R./1> ^+T,/&2 )U&: 21>+ V' ,+&P,2# "412; /&.p N@AA 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>\(\frac{1}{2}\)) 52,(/; '#+ V"\$

% h: Pgl 5\$ V+#(cl V\$\*\$ 5#' 710 %\$)\$ \*+,,+# o]: + ^+(/12, )1+#>4 3210.&2T+ 2. 2 \*P1&(/' 1 ' 8 (: + ^: ' 0' T./1 -: ' (' &4&,+p N@AN 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 %21 "/+>' 9B\$

m\$ 3+1>0 e\$B\$ </,,/2; .0 e\$V\$ d'#; 21g0!%)\$ \*+,,+#0!e\$ B(a/1.' 10!%^\$ <2..2,, oV',+&P,2# Z#>21/c2(/' 1 '8 \/(2; /1 ) /1 2 -',4P1.2(P#2(+0 V+; =#21+p N@AN 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 %21 "/+>' 9B\$

 $5$V + (c0 j V2#(r1+cMV24' #>20 B$ d#' ...8/+,00 e$3$ V+0/12M*#21&' 0 V$9$ -/(; 210 %$)$ *+,,+#0 V$*$ 5#' 71 oV' ,+&P,2# %/; P,2(/' 1. D,,P; /12(+ ^: ' O' T./1 B&(/C2(/' 1 52.+O ' 1 E+7 9#4. (2,! %(#P&(P#+.p N@AN 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 %21 "'/+>' 9B$$ 

m\$ 3+1>0 e\$B\$ </,,/2; .0 "\$ V2#i P2#O(0!E\$ j P&+#a20 e\$ j 2(.2#2.0 e\$ B(a/1.' 10!]\$B\$ 62##' P10!%)\$ 
\*+,,+#0!%^\$ < 2..2,, oD1(+#2&(/' 1 ' 8 2,T: 2M]' &' T: +#', 7/(: 2 -',4P1.2(P#2(+0 3/T/0 %(P0/+0 =4 V"!%/; P,2(/' 1.p!N@A? 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 -: /,20+,T: /2 -B\$

E\$ 3+/' 2((.0 5\$V+#(c0 j \$ V2#(r1+cMV24' #>20 ]\$"\$ ^'; ' 0V\$9\$ -/(; 210 %\$)\$ \*+,,+#0 B\$ d#' ..8/+,00 V\$\*\$ 5#' 71 o^+(/12, 9: 21>+. 9' 18' #; 2(/' 1 0P#/1> (: + ) 2#,4!%(2(+. '8 ^: '0' T./1 B&(/C2(/' 1p N@A? 5/' T: 4./&2, %' &/+(4 B11P2, V++(/1>0 -: /,20+,T: /2 -B\$

^\$ %140+#0 5\$ < 21>0  $\bigvee$ \$ ^' 2#a0 %\$)\$ \*+,,+#0 o^+T,/&2 ) U&: 21>+ R; =#+,,2 %2; T,/1> %/; P,2(/' 1. -#' C/O+ D1./>: (/1(' (: + ^' ,+ '8 "' &' .2: +U2+1' /& B&/0!/1! $\bigvee$ ' OP,2(/1> (: + %(2=/,/(4 ' 8! 1.5 +; =#21+ -#' (+/1.p N@AF B11P2,  $\bigvee$ ++(/1> '8 (: + 5/' T: 4./&2,M%' &/+(40 %21 \*#21&/.&' 0 9B)

m\$ 3+1>0 e\$ j /11P10 %\$ %: 2/a: 0 %22; +I +( 2,\$0 o1M?!-R\*BM9' 1(2/1/1> -: ' .T: ' ,/T/0. %(PO/+0 = 4!V" %/; P,2(/' 1.\$ B!9'; T2#/.' 1 ' 8 ) -B0 " -B!210 " 6Bp N@AK B11P2, V++(/1>!' 8 (: + 5/' T: 4./&2,M %' &/+(40 52,(/; ' #+0 V"

; 2@>5+34567! BC D' E#\$' F F\$\*D' E\$ "#H/\*\$I #)FJ

A\$ B\$"\$ -24('1210%)\$\*+,,+#0n]: + B=.',P(+\2,P+'8(:+%(2102#0 -2#(/2, V',2#)1(#'T4'8(:+640#'>+10'1/1BiP+'P.%',P(/'12(!NK°9n0,?<\*2(5.#?1%23?7#(?LMN0!AY?IAHH@L\$

N\$ B\$"\$ -24('10]\$^\$)P=21a.0%\$)\$ \*+,,+#210]\$d\$ Zt"'11+,,0nB \*P#(: +#9'; T2#/.'1'8]: +'#+(/&2,210)UT+#/; +1(2,3/; /(/1>%,'T+.8'#(: +9'1&+1(#2(/'1"+T+10+1&+'8]: +#; '+,+&(#/&-'7+#./1BiP+'P.640#'&:,'#/&B&/02(NK210AK°9n0,?<\*2(5.#?1%23?7#(?LMN0!A@NYIAHH@L\$

?\$ e\$)\$ 9P##40 %\$)\$ \*+,,+# 210 "\$B\$  $\bigvee$  &WP2##/+0 nB  $\bigvee$  2#/2(/' 12, %',P(/' 1 ' 8 (: + E' 1,/1+2# -' /...' 1M 5',(c; 211 )i P2(/' 1 D1./O+ 2 %T: +#/82, 92C/(4n0,? 1#\*\*#"; D/52.0) (2 7("? LOMQ!KNG IAHHAL\$

F\$ %\$)\$ \*+,,+# 210 "\$B\$ V&WP2##/+0 nB \2#/2(/' 12, %' ,P(/' 1 (' !(: + 64T+#1+((+0 9: 2/1 )i P2(/' 1 BTT,/+0 (' (: + ),+&(#/&2, "' P=,+ 324+#n0 ,? 4%&'? 1%23? PQ0!?FKF IAHHNL\$

K\$ 3\$ '+'; 21.0 %\$)\$ \*+,,+#0 )\$ %21&: +c 210 V\$ 3' c202M92...' P0 n]: + %(#P&(P#+ '8),+&(#',4(+. /1 94,/10#/&2, -'#+.n0,? 1%23? 4%&'? PR0!AF?J IAHH?L\$

J\$ %\$)\$ \*+,,+# 210 "\$B\$ V&WP2##/+0 n92,&P,2(/' 1 ' 8 (: + \*' #&+ 5+(7++1 -,212# ),+&(#/&2, " ' P=,+ 324+#. 9' 1(2/1/1> 9' P1(+#/' 1 V/U(P#+.n0 S#\*? 4%&'? RS0!GNA IAHH?L\$

G\$ %\$)\$  $^{+}$ ,, $^{+}$ !210 "\$B\$ V&WP2##/+0 nD' 1 "/. (#/=P(/' 1 210 \*' #&+ 5+(7++1] 7' 9: 2#>+0 -,2(+.\$ B \2#/2(/' 12, %' ,P(/' 1 '8 (: +]: #++ -' /1()U(+1./' 1 64T+#1+((+0 9: 2/1)i P2(/' 1.n0 ,? 1#\*\*#"; D/52.0) (2 7("? LQT0!N@Y IAHHFL\$

Y\$ %\$)\$ \*+,,+# 210 "\$B\$ V&WP2##/+0 nD' 1/& %C+ )88+&(. '1 (: + \*' #&+ 5+(7++1-,212#),+&(#/&2, "'P=,+324+#.n0,?4%&'?1%23?PN0!AN@Y?IAHH?L\$

H\$  $e^{B}d_{+2}(: 'P.+0\%)$  \*+,,+#210 "\$B\$  $V_{WP2}$ ##/+0n]: +  $V'_{O}$ 0/8/+0 d' P4M9: 2T; 21]: +' #4\$ 9'; T2#/.' 1 5+(7++1),+&(#/&2, "'P=,+324+# $V'_{O}$ 0+,.' 8 9,24 %7+,,/1>n0:)/93-".0!LSQNANK IAHHFL\$

A@\$ %\$)\$ \*+,,+#0 '\$ h: 21>0 ^\$<\$ -2.(' # 210 5\$^\$ 5#' ' a.0 nV' ,+&P,2# " 412; /&. %/; P,2(/' 1 2( 9' 1.(21( -#+..P#+\$ ]: + 321>+C/1 -/.(' 1 V+(: ' On0 ,? 1%23? 4%&'?0!LSM0!FJA? IAHHKL\$

AA\$  $^{<}_{-2.('\#210 \%)}$  \*+,,+#Q n]/; + %&2,+. ' 8 3/T/0 " 412; /&. 210  $\lor$ ' ,+&P,2# " 412; /&.nQ/1 823@.)/2 75.-(5-.2)/; E&/) 3"('Qj  $\lor$ V \\+#c 210 5\\^' PU I) 0.\\\$LQ 5/#a: 2P.+#Q 5' .(' 1Q IAHHJL\\$

AN\$ '\$ h: 21>0 %\$)\$ \*+,,+#0 5\$^\$ 5#' 'a. 210 ^\$<\$ -2.('#0 n9'; TP(+# %/; P,2(/' 1 '8 3/i P/O D1(+#82&+. D\$]: +'#4 210 BTT,/&2(/' 1 (' Z&(21+b<2(+#n0,? 1%23? 4%&'?0!LSM0!A@NKN IAHHKL\$

A?\$ %\$)\$ \*+,,+#0 '\$ h: 21> 210 ^\$<\$ -2.('#0 n9'; TP(+# %/; P,2(/' 1 ' 8 3/i P/O D1(+#82&+. DD\$ %P#82&+ ]+1./' 1MB#+2!" +T+10+1&+ ' 8 2!5/,24+# 210  $\vee$ ' 1',24+#n0,? 1%23? 4%&'?0!LSM0!A@NJG IAHHKL\$

AF\$ E\$ ]X210#20%) \* +,,+#0 ^\$ < \$ -2. (' # 210 B\$ 5200 n^' (2(/' 12, "/88P./' 1 B1/.' (#' T4 ' 8 6P; 21 R=/i P/(/1 8#'; AKE!EV^!^+,2U2(/' 1n0,?632.?1%23?7#(?0!LLN0!ANKJN IAHHKL\$

AK\$ %\$)\$ \*+,,+# 210 ^\$<\$ -2.(' #0 nZ1 %/; P,2(/1> 3/T/0 5/,24+#. 7/(: 21 BTT,/+0 %P#82&+ ]+1./' 1\$ -+#/' 0/& 5' P102#4 9' 10/(/' 1. 210 R10P,2(/' 1. n0 ! "#\$%&'? ,?0!NL0!A?K@ IAHHJL\$

AJ\$ %\$)\$ \*+,,+#0 ^\$ < \$ -2. (' #0 B\$ ^' 10 % 5' >P.c 210 5\$^\$ 5#' ' a.0 n]: + )88+&( ' 8 \*' #&+ ]#P1&2(/' 1 ' 1 V'' %/; P,2(/' 1. ' 8 5P,a < 2(+# ]#21.T' #( -#' T+#(/+. 210 D1(+#82&/2, < 2(+# %(#P&(P#2, -#' T+#(/+.n0.? 4%&'? 1%23\$0 LSS0!AG@AA IAHHJL\$

AG\$ %\$)\$ \*+,,+# 210 ^\$ < \$ -2. ('#0 o3+1>(: %&2,+. '8 3/T/O "412; /&. 210  $\bigvee$ ',+&P,2# "412; /&.p0/1 4.#(22; "/9' #0 5%2 4) ("0"( 7&3\$#'"-3 #/!"#(#3\$-5"/9\$ ^\$5\$B,(; 210 B\$j\$ "P1a+#0 3\$ 6P1(+#0 1\$)\$ j,+/10 ) 0.\$ < '#,0 %&/+1(/8/&0 %/1>2T' #+0 TT\$ AFNMAK@!IAHHGL\$

AY\$ %\$)\$ \*+,,+#0 "\$ '/10 ^\$ < \$ -2.(' # 210 B\$  $\bigvee$ 2&j +##+,,0 e#\$0 o $\bigvee$ ',+&P,2#!" 412; /&. %/; P,2(/' 1 '8 R1.2(P#2(+0 3/T/0. 2( 6' 7 640#2(/' 1\$ -2#2; (+#/c2(/' 1 210 9'; T2#/.' 1 7/(: "/88#2&(/' 1 %(P0/+.p0!"#\$%&'"()\*,?0!NM0!NNJHMNNGH!IAHHGL\$

AH\$! %\$)\$!\*+,,+#0 ^\$\forall \$!\+12=,+ 210 ^\$<\$!-2.('#0 09'; TP(+#%/; P,2(/'1'82"--9-:'.T:',/T/0 5/,24+#\$ %(#P&(P#2, 9: 21>+. 2. 2 \*P1&(/'1'8 \forall ',+&P,2# %P#82&+ B#+2p0:)/93-".0!LM0!JKKKM JKJA IAHHGL\$

N@\$ 6\$D -+(#2&: +0 %\$)\$ \*+,,+# 210 e\$\*\$ E2>,+0 o-2#(/2, \' ,P; +. 8#'; \\'' %/; P,2(/' 1.p0 ! "#\$%&'"()\* ,?0!NT0!NN?GMNNFA!IAHHGL\$

NA\$ ^\$%\$ B#; +1g0!Z\$"\$ R/((' g 210!%\$)\$ \*+,,+#0 o-: '.T: ',/T/0!9'; T' 1+1( \\',P; +.\$ D\$ "+(+#; /12(/' 1 210 BTT,/&2(/' 1 (' "/88#2&(/' 1 ^+8/1+; +1(!V+(: ' 0.p0 ! "#\$%&'"()\* ,?0!NU0!G?FM GFF!IAHHYL\$

NN\$ %\$)\$ \*+,,+# 210 ^\$ < \$ -2.(' #0 o9' 1.(21( %P#82&+ ]+1./' 1 %/; P,2(/' 1. ' 8 3/T/O 5/,24+#.\$ (: + %+1./(/C/(4 ' 8 %P#82&+ B#+2. 210 9'; T#+../=/,/(/+.p0,? 1%23? 4%&'\$0 LLL0ANYAMANYG!IAHHHL\$

N?\$ %\$)\$ \*+,,+#0 "\$ 6P. (+# 210 j \$ d27#/. &: 0 nD1 (+#T#+(2(/' 1 ' 8 EZ))%' 9#'. . \mathrm{\matrx\mathrm{\mathrm{\mathrm{\mathrm{\mathrm{\mathrm{\mathrm{\mathrm{\mathrm{\mr

NF\$ %\$)\$ \*+,,+# 210 B\$"\$ V2&j +#+,,0 e#\$0 oB1 D; T#' C+0 ); T/#/&2, -' (+1(/2, )1+#>4 \*P1&(/' 1 8' # V',+&P,2# %/; P,2(/' 1. '8-: '.T: ',/T/0.p0,? 4%&'? 1%23?!0!LSOQ!GKA@MGKAK!IN@@@L\$

NK\$ %\$)\$ \*+,,+#Q oV',+&P,2# " 412; /&. %/; P,2(/' 1. ' 8 3/T/O 5/,24+#.pQ ,? 1-.. C\$"/? 1#\*\*? D/5? 7 ("\$Q UQ!NAGMNN? IN@@@L\$

NJ\$ %\$)\$ \*+,,+# 210 9\$\*\$ 5,2/&: 0 0)##' # ).(/; 2(+. 8' # \*/((+0 -2#2; +(+#.\$BTT,/&2(/' 1 (' !69,b" 9, \/=#2(/' 12,\M^' (2(/' 12,\K^+&(\#' .\&' T4p0,?+1\%23?+<; \$0 NNQ!F@HMFAN!IN@@AL\$

NG\$ %\$)\$ \*+,,+#0 nV',+&P,2# "412; /&. %/; P,2(/'1'8-:'.T:',/T/0 5/,24+#.n "/3/T/0 5/,24+#.0 e':1 j 2(.2#2.210]:'; 2. dP(=+#,+(1)0.\$L0 %T#/1>+#0 N@@@\$YHMA@G\$

NY\$  $\lor$ 8 %8: 1+/0+#g 210 %\$)\$ \*+,,+#0 o $\lor$ 7,+&P,2# "412; /&. %/; P,2(/' 1. ' 8 2!-: ' .T: ' ,/T/0 "+(+#>+1(! $\lor$ /U(P#+p0,? 4%&'? 1%23\$0 LSU0!A??AMA??G!IN@@AL\$

NH\$ %\$)\$ \*+,,+#0 j \$ d27#/. &: 210 B\$"\$ V28j +#+,,0 e#\$0 o - ',4P1.2(P#2(+0 \*2((4 B&/0. /1 3/T/0 5/,24+#.\$ D1(#/1./& 210 ) 1C/#' 1; +1(2,!9' 1(#/=P(/' 1. (' ]: +/# R1/i P+ -: 4./&2,!-#' T+#(/+.p0,?632.?1%23? 7#(\$0 LT00!?AYM?NJ IN@@NL\$

?@\$ %\$)\$ \*+,,+#Q 9\$B\$ 5#' 71gQ "\$]\$ E/cc2 210 j \$ d27#/.&: Q oEZ)%' &#' ...M#+,2U2(/' 1 #2(+. 210 +(: 21' , O/. (#/=P(/' 1 2&#' ... ; +; =#21+.pQ ! "#\$%&'? ,\$Q RTQ!A?HJMAF@F!!N@@NL\$

?A\$ V3\$ %(#20+#g 210 %\$)\$ \*+,,+#Q oB!\*,+U/=,+ B,,M2('; !V'0+, '8 "/; +(: 4,. P,8' U/0+ 8' # V',+&P,2# "412; /&. %/; P,2(/'1.pQ,? 4%&'? 1%23? 60!LSQQ!A@GFMA@Y@!IN@@NL\$

?N\$ B\$]\$%\$ ] 24,' # 210 %\$)\$ \*+,,+#0 o%(#P&(P#2, %(PO/+. '8 -: 4&' =/,/T#' (+/1. 8#'; 7\$".-\*"/)\$! 9'; =/1/1> %T+&(#'.&' T40]: +#; '0412; /&.0210 V',+&P,2# V'0+,/1> /1 21 R10+#>#20P2(+ 5/'&:+; /.(#4) UT+#/; +1(p0,?1%23?<;\$0 NP0!AFJG IN@@NL\$

?? $^{<}$  -2. (' #0  $^{\lor}$  \+12=,+ 210 %)\\$ \*+,,+#0 03/T/0 5/,24+#.0 EV^ ^+,2U2(/' 10 210 9'; TP(+# %/; P,2(/' 1.p0 6((? 1%23? F2'\$0 MU0!F?YMFFJ IN@@NL\$

?F\$ 6\$B\$ %(+#1 210 %\$)\$ \*+,,+#0 092,&P,2(/' 1 ' 8 (: + "/+,+&(#/& -+#; /(/C/((4 -#' 8/,+ 8' # 2 E' 1P1/8' #; %4.(+; \$BTT,/&2(/' 1 (' 2 3/T/O 5/,24+# %/; P,2(/' 1p0,?1%23?4%&'?0!LLR0!?F@AM?FA?IN@@?L\$

?K\$ %\$)\$ \*+,,+#0 j \$ d27#/.&: 0210 ]\$5\$ < ' ',80 o^: ' O' T./1 )U: =/(. 2 -#+8+#+1&+ 8' # %',C2(/' 1 = 4 -',4P1.2(P#2(+0 '' '&' .' : +U2+1' /& B&/Op0,?632.?1%23?7#(\$0 LTU0!FF?FMFF?K IN@@?L\$

?J\$!E\$\\$!),0: '0 %\$)\$!\*+,,+#0 %\$!]#/. (#2; ME2>,+0 D\$\\$ -' ,' c' CQ j \$ d27#/. &: 0 o -' ,4P1.2(P#2(+0 "' &' .2: +U2+1' /& C.\$ "' &' .2T+1(2+1' /& B&/O \_ "/88+#+1&+. /1 3/T/O  $\bigvee$ 2(#/U -#' T+#(/+. 8#' ; (: + 3' .. '8 Z1+ "' P=,+5' 10p0,?632.? 1%23? 7#(?0 LTU0!JF@HMJFNA!IN@@?L\$

?G\$!"\$^\$ 92#,g 210 %\$)\$ \*+,,+#0 0\*#++ )1+#>4 ' 8 < 2(+# ]#21.8+# /1(' 2!640#' T: ' =/&!V+0/P; \$ 1: + )88+&( ' 8 - ' ,4P1.2(P#2(/' 1p0:) /93 - ".0!LP0!YKJ@MYKJF IN@@?L\$

?Y\$ %\$)\$ \*+,,+#Q ^\$\*\$ "2,,/1>+#Q 210 -\$9\$  $\bigvee$ &j /11+4Q  $\bigvee$ B!-#'>#2; !'89';  $\bigvee$ TP(2(/'12, 9:+; /. (#4)U+#&/.+.8'# (:+\*/#. (M%+; +. (+# d+1+#2, 9:+; /. (#4 9'P#.+pQ,?1%23?<;?Q!RLQ!NY?MNYG  $\bigvee$ PM.+pQ,?1%23?<;?Q!RLQ!NY?MNYG  $\bigvee$ PM.+pQ

?H\$ E\$ j P#&+#a20 e\$\*!E2>,+0 %\$)\$ \*+,,+# 210 -\$ 52,>2C40 oV' O+,. (' 212,4c+ .; 2,, 21>,+ 1+P(#' 1 .&2((+#/1>!8#'; P1/,2; +,,2#,/T/O C+./&,+.p0 4%&' F2G <\$!QP0!@KAH@? IN@@FL\$

F@\$ 9\$ ^' 2&: 0 %\$)\$ \*+,,+#0 e\$B\$ < 2#Og0!%\$^\$ %: 2/a: 0!V\$ h+#' P>20!210 < \$ %(/,,7+,,0!09' ; T2#/.' 1 ' 8 1"' 210 =.) /' \*2((4 B&/0 9' 1(2/1/1> -: ' .T: 2(/04,&: ' ,/1+. ' 1 V+; =#21+ -#' T+#(/+.p0 ! "#(%23"'5.& OM0!J?FFMJ?KA IN@@FL\$

FA\$ -/(; 210  $\lor$ \$ 9\$I %P/(.0 \*\$I  $\lor$ 2&j +#+,,0 B\$ " \$0 e#\$I \*+,,+#0 %\$ ) \$0 o $\lor$ ' ,+&P,2#M3+C+, Z#>21/c2(/' 1 ' 8 %2(P#2(+0 210 -' ,4P1.2(P#2(+0 \*2((4 B&/0. /1 2!-: ' .T: 2(/04,&: ' ,/1+ 5/,24+# 9' 1(2/1/1> 9: ' ,+. (+#' ,p0 ! "#(%23"'5.& OM0!AK?AYMAK?NY IN@@FL\$

FN\$ -/(; 210  $\lor$ \$ 9\$I d#' . .8/+,00 B\$I %P/(.0 \*\$I \*+,,+#0 % )\$0 o^' ,+ '8 &: ' ,+. (+#' , 210 T' ,4P1.2(P#2(+0!&: 2/1. /1!,/T/OMT#' (+/1!/1(+#2&(/' 1.\$  $\lor$ ' ,+&P,2# O412; /&. ./; P,2(/' 1!' 8! #: '0' T./1 /1 2 #+2,/. (/&; +; =#21+ +1C/#' 1; +1(p0 ,? 63? 1%23? 7#( LTN\$FKGJMFKGG IN@@KL\$

F?\$ %P/(.0 \*\$I -/(; 210  $\lor$ \$ 9\$I \*+,,+#0 %\$ )\$0 o $\lor$ ',+&P,2# "412; /&. D1C+.(/>2(/' 1 ' 8 (: + %(#P&(P#2, -#' T+#(/+. ' 8 -: ' .T: 2(/04,+(: 21' ,2; /1+ 3/T/0 5/,24+#.p0 ,? 1%23? 4%&'? ANN\$NFFGAF IN@@KL\$

FF\$ -/(; 210  $\lor$ \$ 9\$I %P/(.0 \*\$I d27#/.&: 0 j \$I \*+,,+#0 %\$ )\$0 o  $\lor$  ',+&P,2# "412; /&. D1C+.(/>2(/' 1 ' 8 (: + "412; /&2, -#' T+#(/+. ' 8 -: ' . T: 2(/04,+(: 21',2; /1+ 3/T/O 5/,24+#.p0 ,? 1%23? 4%&'? ANN\$NFFGAK IN@@KL\$

 $FK\$ *+,,+\#0 \%)\$I d27\#/.\&: 0j \$0 o-\#' T+\#(/+. '8 O' \&' .2: +U2+1' /8 2&/OM\&' 1(2/1/1>,/T/O. 210 (: +/\#/18,P+1&+ '1 (: +8P1&(/' 1 '8 (: +d-9^ #: 'O' T./1p0 1-..? C$"/? 75.-(5?! "#$!LUSFAJMFNN IN@@KL$")$ 

FJ\$ 92##/,,' M]#/TTQ  $\bigvee$  \*\( \*+,,+#Q %\) \$\( 0 \) C/O+1&+ 8' # 2  $\bigvee$  +\( : 21/. ; =4 < : /\( : M?!-' ,4P1.2(P#2(+O 3/T/O.  $\bigvee$  24 B88+&(  $\bigvee$  +; =#21+ -#' (+/1 \*P1&(/' 1pQ ! "#(%23"'5.& OO\$A@AJFMA@AJH IN@@KL\$

FG\$ \*/(&: 0 5\$d\$1 ^24.: P=. a/40 B\$1 ),+8(: +#/' P0!V\$1 < 2#0\$ 9\$e\$]\$1 d/2; T2T20!V\$1 h: +. (a' C0!' \$1 -/(; 210 V\$9\$1 %P/(.0 \*\$1 d#' ...8/+,00 B\$1 -/(+#20 e\$1 %7' T+0 <\$1 h: ' P0 ^\$1 d+#; 2/10 ^\$%\$0 \*+,,+#0 %\$)\$0 05,P+ V2((+#\$ %(#' 1> %&2,/1> ' 8 V' ,+&P,2# " 412; /&. ' 1 5,P+ d+1+b3p0 05 V ^+.+2#&: ]+&: 1/&2, ^+T' #( ^9?JYY IN@@KL\$

FY\$ d#' . .8/+,00 B\$I \*+,,+#0 %\$ )\$I -/(; 210  $\bigvee$ \$ 9\$0 oB!#' ,+ 8' # 0/#+&( /1(+#2&(/' 1 . /1 (: + ; ' OP,2(/' 1 ' 8 #: ' O' T ./1 = 4  $\omega$ M?!T' ,4P1 . 2(P#2(+0 ,/T/0 .p0 4 .# (? A) 5? 6() ; ? 7(" LSM\$ FYYYMFYH?! IN@@JL\$

FH\$ d#' . .8/+,00 B\$I \*+,,+#0 %\$ )\$I -/(; 210 V\$ 9\$0 09' 1(#/=P(/' 1 ' 8 Z; +>2M?!\*2((4 B&/0. (' (: + 1: +#; ' 0412; /&. ' 8 V+; =#21+ -#' (+/1 %' ,C2(/' 1p0 ,? 4%&'? 1%23?! LLS\$ YH@GMYH@H IN@@JL\$

 $K@\$ \lor 2\#(r1+cM\lor 24' \#>20 j \$l -/(; 210 \lor \$9\$l d\#' ...8/+,00 B\$l *+,,+#0 \%$)\$l 5\#' 710 \lor \$*\$0 o^+(/12, 9' P1(+#/' 1 \%7/(\&: \lor+\&: 21/.; /1 \/./' 1 )C2,P2(+0 = 4!\V' ,+&P,2# \%'; P,2(/' 1.p0 ,? 63? 1\%23? 7#(? LTRS!AJK@NMAJK@? IN@@JL$$ 

KA\$ d#' . . 8/+, OQ B\$I \*+,,+#Q %\$ )\$I -/(; 210  $\lor$ \$ 9\$Q o9' 1C+#>+1&+ '8  $\lor$ ' ,+&P,2# "412; /&. %/; P,2(/' 1. '8  $\lor$ +; =#21+ -#' (+/1. pQ 4.#52"/' H+75. - ( I -/( J2/ QNS!?AMF@ IN@@GL

KN\$ B,+U210+#\'\ >+,0 B\$I ]210 j \$]\$I < 2,0; 2110 6\$I \*+,,+#0 \$\$)\$I 5#' 710 \\\$\*\$I 6P. (+#0 "\\$ o\*,+U/=/,/(4 ' 8 ^2. 3/T/0 \\'\' 0/8/&2(/' 1. %(P0/+0 = 4 \\^6!\%' ,/OM\(2(+ E\\^^ 210 \\'\' ,+&P,2# " 412; /&. \\'\'; P,2(/' 1.p0! "#\$\\^2'; ,\$!PM\$!NJHGMNGAN IN@@GL\$

K?\$ -\$<\$ 32PQ B\$ d#' ...8/+,0Q %\$)\$ \*+,,+#Q  $\bigvee$ \$9\$ -/(; 21Q  $\bigvee$ \$\*\$ 5#' 71Q o" 412; /& %(#P&(P#+ ' 8 ^+(/14,/0+1+ 3/>210 ' 8 ^: ' O' T./1 -#' =+0 =4  $\bigvee$ ' ,+&P,2# %/; P,2(/' 1.pQ!,? 8#\*?! "#\$ MNTS!H@JMHAG IN@@GL\$

KF\$ %\$)\$ \*+,,+#Q oB&4, 9: 2/1 9' 18' #; 2(/' 1. /1 -: ' .T: ' ,/T/O 5/,24+#.\$ B 9' ; T2#2(/C+ %(PO4 ' 8 " ' &' .2: +U2+1' /& B&/O 210 %2(P#2(+O \*2((4 B&/O.pQ 1%23? 4%&'?: "\$"; ' LUM\$!GJMY@ IN@@YL\$

KK\$ E\$ j P&+#a20 e\$\*\$ E2>,+0 e\$E\$ %2&: .0 %\$)\$ \*+,,+#0 e\$ -+1&+#0 B\$e\$ e2&a.' 10 210 e\$ j 2(.2#2.0 o3/T/O =/,24+# . (#P&(P#+ O+(+#; /1+O!=4 (: + ./; P,(21+' P. 212,4./. '8!1+P(#' 1 210!UM#24 .&2((+#/1> 02(2p0! "#\$%&'? ,\$!PU\$! N?KJMN?JG IN@@YL\$

 $KJ\$ \ B\$ \ d\#' \ ..8/+,00 \ V\$9\$ \ -/(; \ 210 \%)\$ \ ^*+,,+\#0 \ Z\$\%' \ P=/2.0j\$ \ d27\#/.\&:0 \ oD1(+\#12,:40\#2(/'11/8\#+2.+.0P\#/1>2&(/C2(/'1'8(:+dMT\#'(+/10\%'PT,+0\#+\&+T('\##:'0'T./1p0,?8\#*?!"#\$!MRL\$!FGYMFYJ IN@@YL\$$ 

KG\$ V\$ ^' 2#a0 %\$)\$ \*+,,+#0 o%(#P&(P#+ 210 " 412; /&. ' 8 2 \*,P/O -: 2. + 5/,24+# ' 1 2 %' ,/O %PTT' #( 2. Z=.+#C+O =4 2!V' ,+&P,2# " 412; /&. 9'; TP(+# %/; P,2(/' 1p0 :) /93-".0!TO\$!ANFJH\_ANFG?! IN@@YL\$

 $KY$ d$^*$ %2,>20' 0^$ V2#i P21(^0 B$ \' >+,0 B$' $B,C+.0 $$)$ *+,,+#0 E$!V' #+,,+(0!$$!5' P2c/c0 o%(#P&(P#2, %(P0/+. '8 60 \MA!d2> TJ&( 210 0(. 01(+#2&(/' 1 7/(: \T# "+(+#; /1+0 =4 %', P(/' 1 EP&,+2#!V2>1+(/&!^+. '121&+p0! "#(%23"'5.&0!0R$!N?KKMN?JG!IN@@HL$$ 

J@\$ V\$ ^' 2#a0 %) \*+,,+#0 oV' ,+&P,2# "412; /&. %/; P,2(/' 1 %(PO4 ' 8 9' ##+,2(+0 V' (/' 1. /1 -: ' .T: ' ,/T/O 5/,24+# V+; =#21+.p0 ,? 4%&'? 1%23?! 0!LLMS!A?NNHMA?N?F IN@@HL\$

JA\$ %\$-\$%' 1/0 e\$B\$ < 2#0g0!%\$)\$ %+10!%\$)\$ \*+,,+#0!%\$^\$ < 2..2,,0!0)88+&('8]#21. R1.2(P#2(/'1'1 \ \\ \'',+&P,2# \ Z#>21/c2(/'1/12-:'.T:',\T/0 \\ \+; =#21+p0! \ "#(%23"'5.&0!0R\$!AA@HGMAAA@G!IN@@HL\$

J?\$ B\$ \' >+,0 d\$ ^+P(: +#0 \\\$5\$ ^' 2#a0 j\$]\$ ]210 6\$ < 2,0; 2110 %\$)\$ \*+,,+#0 "\$ 6P. (+#0!052&a=' 1+ &' 18' #; 2(/' 12, 8,+U/=/,/(4 ' 8 (: + ,/T/0 ; ' 0/8/+0 ; +; =#21+ 21&: ' # ' 8 (: + : P; 21 EM^2. T#' (+/1 +/1 EM^2. T#' +/1 EM^2. T#'

 $/1C+.(/>2(+0=4.',/0M.(2(+EV^210;',+&P,2#0412;',&.!./;'P,2(/'1p0!!6B!"#323@.)/2'0!LNPRS!NGKMNYKIN@A@L$$ 

JF\$ %\$^\$ < 2..2,\( \) V\$B\$ V&92=+\( \) 9\$" \$ < 2..2,\( \) ^\$Z\$ BO,' 80 %\$)\$ \*+,,+\( \) 0%' ,\( \) OM%(2(+ 6MN!EV^ 210 V''!%)'; P,2(/' 1. ' 8 -' ./(/' 12, \) \) '; +\( \) ' 8 2 V' 1' P1.2(P\( 2(+0 -: ' .T: ' ,\) T/O V+; =\( 21+\) %(\( P\( 2, \) \); T,\( \) 2(/' 1. ' 8 "' P=,+ 5' 10 3' &2(/' 1\) \) 10 2 4%&'? 1%23?! \( \) ! OLLOS!AAFGFMAAFY? IN@A@L

JK\$ "\$-\$ 6P#. (0 B\$ d#' . .8/+,00 "\$3\$ 341&: 0 %\$ \*+,,+#0 ]\$" \$ ^' ; '0 j \$ d27#/. &: 0  $\bigvee$ \$9\$ -/(; 210 -\$6\$ ^+>>/' 0 oB 3/T/O -2(: 724 8' # 3/>210 5/10/1> 0. E+&+ . . 2#4 8' # 2 92112=/1' /O d -#' (+/1\\&' PT,+O ^+&+T(' \pu \cdot ?! "\pi'? 1\\23\\0 TRU\$AGHKF\\AGHJF I\\@A@L\\$

JJ\$ 5\$ V+#(c0 V\$ 3Pg0 V\$\*\$ 5#' 710 %\$)\$ \*+,,+# 0%(+#/& 210 ),+&(#' 1/& D18,P+1&+. ' 1 (: + ]' #./' 12, )1+#>4 3210.&2T+ ' 8 ^+(/12,p0!"#\$%&'?,\$0 A@A\$ 3AGM3AH IN@AAL\$

 $JG\$! ]\$!) 1>+,=\#+\&: (0 ]\$!62P=0 j \$ \%P=0 B\$ ` '>+,0 $\sim $^' 2\#a0 \%$)\$ *+,,+\#0 ^$6$6$ E+P=+\#(0 210 5\$ " '=1+\#0 09: 2\#2\&(+\#/.2(/' 1 '8 2 1+7 &+\#2; /0+) Z\% . T+&/+.$ .41(:+./. 210 /1C+. (/>2(/' 1 '8 (:+\#; '(\#' T/\& T: 2.+=+: 2C/' P# 210 /18,P+1&+ ' 1 (:+=/,24+# 2#&: /(+&(P#+ '8.(\#2(P; &'#1+P; ./T/0; '0+,!; +; =#21+.p0 7#05 8) 552.0!GSYHHYMH@AA IN@AAL$$ 

JY\$ 5\$ V+#(c0 B)\$ % (#P(.0 %\$)\$ \*+,,+#0 V\$\*\$!5#' 710 oV',+&P,2# ./; P,2(/' 1. 210 .',/OM. (2(+  $EV^{(+)}$  /1C+. (/>2(+ 0412; /82,!. (#P&(P#+ /1 #: ' O' T./1 2&(/C2(/' 1p ! "#(%"3"() 25 ! "#\$%&'"() 6(5) B ! "#323@.)/2'0!AYAY\$ NFKMNKA IN@ANL\$

JH\$ B\$ \ ' >+,0 \ \$ ^' 2#a0 %\$)\$ \*+,,+#0 oB #+/1(+#T#+(2(/' 1 ' 8 1+P(#' 1 .&2((+#/1> +UT+#/; +1(. ' 1!2 ,/T/02(+0 ^2. T+T(/0+ P./1> #+T,/&2 +U&: 21>+; ' ,+&P,2# 0412; /&.p0 ! "#(%"3"() 25 ! "#\$%&'"() 6(5) B ! "#323@.) /2'0!AYAY\$ NAHMNF0!IN@ANL\$

G@\$ B\$ \ ' >+,0 %\$) \$ \*+,,+#0 o6+20>#' PT 9' 18' #; 2(/' 1. ' 8 -: ' . T: ' ,/T/0. 8#' ; V' ,+&P,2# " 412; /&. %/; P,2(/' 1\$ %2; T,/1> 9: 2,,+1>+. 210 9' ; T2#/.' 1 (' )UT+#/; +1(p0 ,? 823@.) /2 ! "#\*#9&0 NFK\$ N?MY IN@ANL\$

GA\$ Z,2P...' 10 5\$0 d#' ...8/+,00!B\$0!-/(; 210! $\checkmark$ \$0!5#' 710! $\checkmark$ \$0!\*+,,+#0!%\$0! $^{\prime}$ >+,0!B\$0!o $\checkmark$ ',+&P,2# 0412; /&.../; P,2(/' 1. #+C+2, .T+&/8/& /1(+#2&(/' 1. '8!T' .(M(#21.,2(/' 12, T2,; /(' 4,; ' 0/8/&2(/' 1. 7/(: #: ' 0' T./1 /1; +; =#21+.p0,?63?1%23?7#(\$0 LMOSFN?FMF?? IN@ANL

GN\$ h: P0 %\$0 5#' 710 V\$\*\$0 \*+,,+# %\$)\$0 o^+(/12, 9' 18' #; 2(/' 1 d' C+#1. Tj 2 ' 8 -#' (' 12(+0 %&: /88 52.+ /1 ^: ' 0' T./1 B&(/C2(/' 1p0 ,? 63? 1%23? 7#(\$0 LMU\$!H?HAMH?HY!IN@A?L\$

G?\$ E\$ 3+/' 2((.0 5\$V+#(c0 j \$ V2#(r1+cMV24' #>20 ]\$"\$ ^'; '0V\$9\$ -/(; 210 %\$)\$ \*+,,+#0 B\$ d#' ...8/+,00 V\$\*\$ 5#' 71 o^+(/12, 3/>210 V' =/,/(4 )UT,2/1. D1(+#12, 640#2(/' 1 210 ^+&' 1&/,+. B&//C+ ^: '0' T./1 %(#P&(P#+.p0! "#(%23"'5.&0!K?\$?GJM?YK IN@AFL\$

GF\$ B\$ \' >+,0 6\$B %&: +/O(0 %\$)\$ \*+,,+#0 e\$ \\ \( \) ' 0 ^\$\\ 520+2P0 \\ \$e\$ ]/aa21+10 j \$ < 2: 2,20 \\ e2P: /2/1+10 " \$ 6P. (+#0 o]: + Z#/+1(2(/' 1 210 " 412; /&. ' 8 ). (#20/' , 210 ). (#20/' , Z,+2(+ /1 3/T/0 \\ \\ +; =#21+. 210 6" 3!" /. & \\ ' 0+,. p0 ! "#\$%&'? ,\$0 A@G\$AAFMANK IN@AFL\$

GK\$ m\$3\$ 3+1>0 e\$e\$ j /11P10 "\$ V2#i P2#0(0 V\$ d: +8,/0 E\$ j P&+#a20 e\$ j 2(.2#2.0 e\$ B(a/1.' 10 ]\$B\$ 62##' P10 %\$)\$ \*+,,+#0 %\$^\$ < 2..2,,0 oB,T: 2M]' &' T: +#', D. <+,, " +./>1+O ('!-#' (+&( -',4P1.2(P#2(+O -: '.T: ',/T/O.\$ V'' %/; P,2(/' 1.p0! "#\$%&'?,\$0 A@H\$ AJ@YMAJAY IN@AKL\$

GJ\$ m\$3\$ 3+1>0 e\$e\$ j /11P10 B\$] 92C2c' .I %\$ < \$ 9211+#0 %\$^\$ %: 2/a: 0 %\$) \$ \*+,,+#0 %\$^\$ < 2.2,,0 oB,, 1M?! -R\*B 2#+ 1'((:+.2; +\$ V"./; P,2(/'1.#+C+2,0/88+#+1&+./1; +; =#21+ '#>21/c2(/'18'#)-B0 "6B 210 "-Bp0! "#(%"3"() 25! "#\$%&'"() 6(5) B! "#323@.)/2'0!AYJ@\$AANKMAA?F!IN@AYL\$