

!"#\$%&'(")*)+,\$\$'-./0%1234%56#7#"89):%;\$"'-\$07%<"=%

!

" #\$\$%&' #!(%%&')\$*+, #-!.#(% , #/+!(0-!*+.*012*+, #-!12#+.+3!4!(' !, #!5678!9#/' &0.!: .(.#!
;#(% , #/!&<!. , #!=# (>!1567?!/#%)*#0.!&<!. , #!@/#+ -#0.*(\$!AB(/-!&/!CD%#\$\$#0%#!*0!E (, !(0-!
:%*#0%#!;#(% , *01>!(!F (. *&O(\$!G&(/-HI #/.<*#-!;#(% , #/!>(!)/&2-!\$#(-#/!*0!' J!\$&%(\$!(++&%*(.*&O>!
(0-!. , #!-*/#%. &/!&<!. , #!9#/' &0.!! &20%\$!&<!. ;#(% , #/!&<!E (, #' (.%+!KH75!:. (.#B*-#!E (, !L(*!3!!
AO-!&/!. , #!\$(+.!7M!J#(/+!4!, (N#!O##O!.#(% , *01!+.2-#0.+!(0&2!. , #!)&B#/#!&<!' (, #' (.%+3!

!

P##%#0.\$J>!4!<*0-!' J+#\$-!\$&&Q*01!(/&20->!. (Q*01!(!-##)!0/# (, >!(0-!B&0-#/*01!, &B!4!1&!. , #/#>!*0!
. , *+!/&&' >+)#(Q*01!.&!(\$\$!&<!J&23!4!B&0-#/#B, (.!)#(\$+!&<!B*+ -&' !4%(0!&<<#/#R!B, #0!. , #/#!(/#!

/#+) &O+#!*>b: &' #.* #+!4!%' #!%\$&+#>!02.!4!. (Q#!&2.!., #+#!., *01+(0-!., #J!/#' *0-!' #!., (!
. , #/#!*+!(\$B(J+!, &)#3b!

!
A!\$* . \$#!(-N*%#>*<!J&2!-&OS.!(\$/#(-J!, (N#!J&2!/!&B0!+(%/#-!020-\$#!&<!, &)#!*0!B, *, !.&!./#(+2/#!
+.&/*#+!&<!. , #!%, *\$-/#0!B, &+#!\$*N#+LJ&2SN#!.&2%, #-!(0-!B, &SN#!.&2%, #-!J&2/!\$*N#+!<&/#N#/#>!.S+!
O&!.!&&!(. #3!!; , #+#!/#' *0-#/#>!. , #+#!+.&/#+!%(0!, #)\$!2+!1#.!., /&21, !#N#0!., #!-(/Q#+!-(J+!
B, #0!B#!' (J!<##\$!(+!., &21, !&2/!\$#++&0!B(+!(!-*+(+.#/!&!/B#/#' (*0!</2+./(.#-!., (.!B#!%(OS.!
, #)\$!(+2-#0!.!2/0!., #!%&/0#/#>!/!(OJ., *01!#\$+#!., (!.#(+/!(.!&2/!, #(/!(0-!+&2\$(+!%\$(++&&' !
.#(% , #/+3!!` &!. , *+!+' (\$\$!(N&!<&/!J&2/+##\$!.&!, #)\$!+(N#!., #!+.&/#+!</&' !0#*01!\$&+!(0-!/#' *0-!
J&2!B, J!B#!-&!B, (.!B#!-&!#N#/#!-(J3!

!
E (OJ!&<!2+!, (N#!(!.#(% , #/!</&' !&2/!) (+.!B, &!*0+)*#-!2+>B, &!0#\$*#N#-!*0!2+!(0-!#0%&2/(1#-!
2+3!!; , (0Q!J&2>E/+3!F&.(/*V!!; , #J!B#/#!(0\$#!.&!+##!_+&' #., *01\$!0!#(% , !&<2+!., (.!B#!-*OS.!
/#%&10*[#3!!; , #J!) (.#0.\$J!#0%&2/(1#-!2+!.&!B(\$Q!&2/!c&2/0#J!(0-!\$&&Q!-##)\$J!#0&21, !.&!+##!
., (.!_+&' #., *01\$!B*, *0!&2/+##\$N#+3!

!
4!+, &2\$-!)/&N*-#!(\$*..\$#!0(%Q1/&20-3!

!
4!(/*N#-!, #/#!(.!, #!d0*N#/#*J!&<9#/' &0.!*0!., #!<(\$\$!&<17MM5!/#(-J!.&!#' 0(/Q!&O!(!-#1/##!#*0!
' (. , #' (.%+!B*, !0&!-#(!(!(\$!B, #/#!., (.!B&2\$-!\$#(->!02.!%&ON*0%#-*!B&2\$-!0&.!\$#(-!0(%Q!.&!
., #!%\$(++&&' 3!!; &' #B, #/#!&0!., *+!)(/!&<!. , #!c&2/0#J>4! #.!X*(!!/(N#-3!!4\$' !0&.!+2/#!, &B!*!
, ())#0#-!\$&Q*01!0(%Q>02.!4!00&B!., #/#!B(+!., *+!%&ON#/#(. *&0!B, #/#!+, #!#0%&2/(1#-!' #!.&!
(Q#!(O&., #/!\$&&Q!(.!(!)&+*O\$#!%(/##/!#0!#(% , *01>(-N*+#!' #!.&!%&0+*#/(O&., #/!#-2%(. *&0!
%\$(++!&!/!B&>!#0%&2/(1#-!' #!.&!#D(' *0#1B*, !0&., !#J#+!&)#0!., #!)&+*0*\$*J!&<+!, (/01!' J!
) (+*&0!.&B(-!' (. , #' (.%+!B*, !J&201!' *0-+3!

!
40!., #!' # (0.* #>4!1&.*ON&\$N#-!B*, !A' #/*I &/)+3!!4!+)#0!.** #!B*, !J&201!)&#)\$#!*0!., #!
%\$(++&&' >!, *0*01>+B** ' *01>!)\$(J*01!1(' #+!(0-!&0!., #!/&)#+!%&2/+3!!A.!+&' #!)&*0.>., #/#!B(+!
%\$(/*J333B, (.!4\$-!&0%#!0##0!(-' (0.\$J!&))&+#!.&!B(+!)2\$\$*01!' #!.&B(-!(.!\$#(+!#D)\$&/01!., #!
)&+*0*\$*J!&<!' (Q*01!#(% , *01!' J!\$<#S+!B&/Q3!

!
L\$(+ , !<&/B(-!.&!. , #!<(\$\$!&<17MMe!B, #0!B*, !E (+.#/S+!-#1/##!#*0!, (0-!4!' &N#-!(%/&+!., #!%&20./J!
(0-!B(+!&<<#/#-!' J!<+!.!#(% , *01!)&+*.*&0!(.!(0.(!A0(!T*1, !:%, &&\$!*0!(0.(!A0(!!(\$*&/0*(3!!4!
(/*N#-!.&!<0-!f5!+.2-#0.+!#0!(!%\$(+3!!(!)6517(!)77(-)6(#)-1(10-12-2(-!)7(#),) [+) -8.(0)10(#)(0)6(.)

#N#/J., *013!!4!.&\$-!, ** !., (.!4!, (-!.&!-&! ' &/#>!0#!' &/#>!+(N#!, #/3!!A<.#/!<(+!./(%0*01!(\$\$!., #!
))#/B&/Q!(0-lc2')*01!., /&21, !+&' #!, &&)+>!B#!<&20-!&2/+#\$N#+!(+!<&+. #/!) (/#0.+3!!: #\$\$#0(!
+. (J#-!B*. , !2+!<&/!M!B&0-#/<2\$!' &0., +!0#<&/#!/#20*. *01!B*. , !, #/!<(' \$J3!!4!%&2\$-!<\$\$(!, &\$#!*0!., #!
\$*#1&<!. , (.!%, *\$-3!
!

X(.#/!&O>4!' #.!4N(O3!!T#!-*!-!#N#/J., *01!, #!%&2\$-!.&!./J!' J!)(.*#0%#3!!4!\$&N#-!., *+!0*->!02.!4!%, &+#!
.&!+. *%Q!, ** !B*. , !+(/%(+' !#N#/J!%, (0%#!4!1&.3!!T#!c2+.!+' *\$#-!(0-!%&O.*02#-!.&!. , *0Q!&<!B(J+!. &!
)2+, !' J!02..&0+3!!^0#!-(J!, #!+2<<#/#-!(!+#[2/#!*0!., #!+%, &&\$!)&&\$3!!4!, (-!(!%, (0%#!.&!N*+*!. , ** !
0!., #!, &+).(\$!(0-!B, *\$#!, #!\$(*-!., #/#!&0!., #!N#0.*\$(&/>!4!(\$Q#-!.&!, ** 3!!4!+(*-!., (.!4!B(+!+&/J!
<&/!0&.!#D)/#++*01!., #!%(/#!., (.!4!<#\$.!<&/!, ** >!&/!0&.!0#*01!0*0-#/3!!4!)/&' *+#!' J+#\$-!, (.!-(J!
, (.!' J!+.2-#0.+!B&2\$-!(\$B(J+!00&B!, &B!' 2%, !4!%(/#-!<&/!., #' !</&' !., (.!' &' #0.!&03!!` (J+!
\$(&./!, #!)(++#-!(B(J!(.!, #!, &+)*.(\$3!!4!B(+!+&!(01/J3!!A01/J!(.!, #!+%, &&\$3!!A01/J!(.!, #!), J+*%(\$!
#-2%(*&0!.#(% , #/3!!A01/J!(.!' #3!!4N(O!B(+!#N#/JB, #/#!., (.!4!\$&&0#-3!!4!%&2\$-!0&./!/' (*O!(.!, *+!
+%, &&\$3!
!

" , *\$#!./J*01!.&!Q##)!' J!, #(-!c2+.(O&N#!B(./!\$#N#\$!. , &+#!</+!.!B&J#(/+>!4!/#%&10*[#-!., #!
\$(+.*01!*')(%!., (.!#(% , #/+, (N#!&O!., #!\$*N#+!&<!. , #*/!+.2-#0.+!(0-!., #!&0*1(*&0!B#!, (N#!*O!
-&*01!+&3!!
!

^2/!+.2-#0.+!(/#!&2/!' *++*&03!!A0-!&2/!)(++*&03!!A0-!&2/!\$#1(%J3!!" #!.#(% , !K4` :>!0&..!

/*%, #/!. , #!#D) #/*#0%#!*+!B, #0!J&2!, (N#!. , #!%&2/(1#!.&!+(*\$(B(J!</&' !+, &/#!(0-!+#0!&2. !
&' #. , *01!0#B3!!; , (.S+!B, #/#!. , #!(-N#0.2/#+!(/#V!!; , (.S+!- *<%2\$. !<&/!2+!.&!-&>!(+!.#(% , #/+3!!G2. !
B, (.!*<i B#!, (-!. , #!%&2/(1#!.&!. /J!(OJB(Ja!!; &!(\$\$&B!&2/+ #N#+!. , #!20%#/. (*0.J!.&!(..#')!
+&' #. , *01!0#B!(0-!-*<<#/#0.>!.&!+./#.% , !&2/+ #N#+!(0-!&2/!+. 2-#0.+!0#J&0-!B, (.!*+!+(<#!(0-!
&' <&/.(O\$#a!" , (.!%&2\$-!B#!\$#(/O!(O&2. !&2/+ #N#+a!!" , (.!%&2\$-!&2/!+. 2-#0.+!\$#(/O!(O&2. !
. , #' + #N#+a!!" #!(/#!. , #!%(). (*0+!&<!&2/!%\$(++&&' 3!!" #!(/#!. , #!&0#B, &!% , (/!. , #!%&2/+#!<&/!
&2/!+. 2-#0.+3!!" #!%/#(.#!(0-!)\$O!. , #!\$#++&0+!R!+&!\$# .S+!-#%*-#!.&!\$#(N#!)&/.(0-!+#0!
(-N#0.2/#3!!` &!&0#!. , *01!. , *+!J#(/!. , (.!+%(/#+!J&23!!I /#(.#!(\$#++&0!</&' !+%/(.% , !(0-!<*\$-H.#+.*!
&0!J&2/!+. 2-#0.+3!!; , #0!(+0!. , #' !B, (.!. , #J!. , *0Q!(0-!/#N*+#!*!(!%&/- *01!.&!. , #*/!+211#+.*&0+3!!
A+Q!(!. /2+. #-!%\$\$\$#(12#!.&!&0+#/N#!J&2/!%\$(++&&' !(0-!1*N#!J&2!, &0#+. !<##-0(%Q!(O&2. !B, (.!
. , #J!+(B!R!(0-!. (Q#!. , (.!<##-0(%Q!(0-!%, (01#!, &B!J&2!.#(% , 3!!C01(1#!*0!%&ON#/+(*&0!B* , !
)#&)\$#!*O!&. , #/!02*\$-*01+!(0-!&. , #/!-#) (/.' #0.+!(O&2. !+2%#++<2\$!+./(.#1*+!(0-!. , #0!
+ , (' #\$\$\$+J!(\$ #/!. , #' !.&!<*. !J&2/!&B0!0##-+3!!d+#!B, (.#N# /!/#+&2/%#+!J&2!%(0!<0-!.&!/#(% , !
. , #!+. 2-#0.+!*..*01!/*1 , .!*0!</&0. !&<!J&2!R!(0-!/#(\$*[#!. , #'*') (%. !J&2!, (N#!&0!. , #*/!#-2%(*&0(\$!

