

Ni [fY]gYb`Xi fW`≠bX]Yb.`? i `]bUf]_`i bX
5 fW`]hY`_hi f`Ui Z`GW`]YbYb`Yb hXYW`_Yb`°

9b hXYW`_Yb`G]Y`X]Y` : Ugn]bUh]cb`XYf`Ni [fY]gYb`]b`≠bX]Yb.`j cb
UfW`]hY`_hcb]gW`Yb`A Y]ghYfk`Yf`_Yb`XYf`6U`b`∞ZY`V]g`ni
_i` `]bUf]gW`Yb`9f`YVb]ggYb`Ub`6cfX`"9fZU`fYb`G]Y`U`Yg`ØVYf
Ni [hmdYbž`VY`]YVhY`GhfYW`_Yb`i bX`k`Yfhj`c`Y`H]ddg`ZØf`Y]bY
i bj`Yf[`Ygg`]W`Y`F`Y]gY`"



≠bX]Ybž`Y]b`@UbX`XYf`? cbhfUghYž`XYf` : UfVYb`i bX`XYf`i bYbX`]W`Yb
; YgW`]W`hYbž`V]YhYh`Y]bY`XYf`ZUgn]b]YfYbXghYb`A`Ò[`]W`_Y]hYbž
gY]bY`J]Y`ZU`h`ni`Yf`YVYb.`X]Y`Ni [fY]gY`"A`]h`Y]bYa`GW`]YbYb`Yhnž
XUg`g]W`ØVYf`a`Y`f`U`g`*`+"\$\$\$`?]`ca`YhYf`YfghfYW`_hž`j`YfV]bXYb`X]Y
≠bX]Ub`F`U]k`Umg`A`Yhfc`dc`Yb`a`]h`UV[`Y`Y[`YbYb`8`ØfZYfbž`K`ØghYb
a`]h`6Yf[`Yb`i bX`HYa`dY`gh`A`XhY`a`]h`?ØghYb`cfhYb`"9]bY` : U`fh`a`]h
XYa`Ni [`]gh`a`Y`f`U`g`bi`f`Y]b`HfUbgdc`fha`]h`hY`" `]g]Y`]gh`Y]b` : YbghYf
ni`f`GYY`Y`XYg`@UbXYg`"J`ca`W`Uch]gW`Yb`Hfi`VY`XYf`6U`b`∞ZY`V]g`ni
ni`f`gh`"Yb`GW`Øb`Y]h`XYf`j`cfVY]n]Y`YbXYb`@UbXgW`UZhYb`Yfn`A`h`
YXY`F`Y]gY`]\fY`Y][`YbY` ; YgW`]W`hY`"C`V`]b`XYf`Y]bZUW`Yb
<c`n`_`UggY`c`XYf`"a`"i`i`i`f]ØgYb`?`ca`Zc`fh`Y]bYg`A`U`UfU`U!

9l dfYggYgž'XYf'F \mh\ a i g'XYf'GW]YbYb'i bX'XUg'F UhhYfb'XYf
K U[[cbg'k YfXYb'gWbY''ni 'Y]bYa 'i bj Yfk YWgY'VUFYb
Gci bXhfUW_''HUi WYb'G]Y'Y]b']b'Y]b'5VYbhYi Yfž'XUg'gc'j]Y'ZÀ'hj[
]gh'k]Y' ðX]Yb'gY'Vgh"

9]bZØ\ fi b [']b 'X]Y 'Ni [fY]gYb ']b ' ðX]Yb



GhY''X]f'j cfž'Xi 'g]hnh'Ua ' : YbghYf'Y]bYg'fUhhYfbXYb'K U[[cbgž
k Å\fybX'XfUi » Yb'X]Y '@UbXgWUZh'ðX]Ybg'k]Y'Y]b''YVYbX][Yg
; Ya Å'XY'j cfVY]n]Y\h' 'j cb'XYb' [c'XYbYb'K ØghYb'F U'Ugh\Ubg'V]g
ni 'XYb'Ødd][Yb'FY]gZY'XYfb'GØX]bX]Ybg''Ni [fY]gYb ']b 'X]YgYa
'@UbX'g]bX'k Y]h'a Y\f'U'g'Y]bY' : cfhVYk Y[i b[gUfh'g]Y'j Yf_ØfdYfb
Y]bY'_i 'hi fY''Y'FY]gY'Xi fW'X]Y'NY]h''8]Y' ðX]Ub'F U]k Umgž'Y]bYg
XYf' [fØ» hYb'GW]YbYbbYhnY'XYf'K Y'hž'g]bX'XUg'di 'g]YfYbXY'<Yfn
XYg'@UbXYgž'XUg'hÅ [']W' A]''cbYb'j cb'A YbgWYb'j YfV]bXYh'' : Øf
j]Y'Y' ðXYf']gh'XYf'Ni ['b]W'h'bi f'Y]b'J Yf_Y\fga]hhY'ž'gcbXYfb'Y]b
Cfh'XYg'5i ghUi gWgž'k c' ; YgW]W'hYb' [YhY]'hž'7\U]!HY' [YgW'ØfZh
i bX' : fYi bXgWUZhYb'ØVYf'Y]b' [Ya Y]bgUa Yg'j Y[YhUf]gWYg'H\U']
[YgW'cgYb'k YfXYb"

8]Y' : Ugn]bUh]cb'X]YgYf'F Y]gYb''Y [h']b']\fyf'J]Y'gW]W'h][_Y]h'' ð
_]a Uh]g]YfhYb'K U[[cbg'XYf''i l i f]ØgYb'%'?'`UggYž'k]Y'ja
VYfØ\ a hYb'A U\UfU'Ug '9l dfYggž' ['Y]hYh'a Ub']b' _Øb][[']WYa

?ca Zcfhj cb'A i a VU]bUW'8Y'\ž'a]h'Ghcddg'Ua 'a U`Yf]gWYb
D]Wc`U!GYY`]b`I XU]di f`cXYf`ZØf`Y]b`i bj Yf[Ygg`]WYg`66E!8]bbYf
]b`XYf`K ØghY`H\Uf``K Yf`Yg`Ui h\Ybh]gWYf`a U[ž`k`Å`h`X]Y
Y]bZUWYb`?`UggYbž`k`c`XUg`@YVYb`\Ui hbU`\gdØfVUf`k`]fX`'`j`ca
8i Zh`Zf]gW`[YVfØ`hYb`HYg`V]g`ni`XYb`YV`UZhYb`; Ygdf`ÅWYb`a`]h
A`]hfY]gYbXYb``6YgcbXYfg`VYY]bXfi`W_YbX`g]bX`F`ci`hYb`k`]Y`X]Y`XYg
DU`UW`cb`K`Y`Y`gž`X]Y`Xi`fW`F`U`Ugh`Ub`ZØ`fhi`bX`F`Y]gYbXY`ni
\]ghcf]gWYb`GW`ÅhnYb`k`]Y`XYa`HU`^A`U`U`]b`5`[`fU`c`XYf`XYa
DU`Ugh`XYf`K`]bXY`]b`X]di`f`Vf]b[`hž`k`]Y`Ui`Z`XYf`K`YVgY]hY`j`cb`
@chi`g`HfUj`Y`XYhU]`Yfh`VYgW`f]YVYb`"

5VgY]hg`XYg`?ca Zcfhg`XYf`@`I`i`gnØ[`Y`V]YhYb`Ui`W`X]Y`_`Ugg]gWYb
:`YfbnØ[`Y`XYf`]bX]gWYb`9]gYbVU`b`Y]b`i`bj`Yf[`Y`W`]WYg
9f`YVb]g``G]Y`j`YfV]bXYb`A`Yhfcdc`Yb`k`]Y`?`U`_i`hUž`XUg`U`g`GhUXh
XYf`:`fYi`XY`i`bX`k`]W`h][`Yf`J`Yf`_Y`fg`_bchYbdi`b`_h`[`]`hž`a`]h
UV[`Y`Y`[`YbYb`C`fhYbž`k`c`X]Y`NY]h`gh]`ni`ghY`Yb`gWY]b`h``#`A`i`a`VU]
VY[`]bb`h`c`XYf`YbXYh`gc`a`UbW`Y`F`Y]gY`Ua`7`\`UhfUdUh]`G`X]j`U`j
HYfa`]bi`gž`Y]bYa`I`B`9G7C`!K`Y`h`_i`hi`fYfVYž`XYggYb`[`ch]gWY
5fW`]hY`_hi`f`X]Y`_c`cb]U`Y`J`Yf[`Ub[`Yb`Y]h`XYg`@UbXYg
k`]XYfgd]Y[`Y`h``J`cb`Xcfh`Ui`g`_Ubb`a`Ub`XUg`;`c`XYbY`8fY]YW_
Yf`_i`bXYb`i`Y]bY`F`ci`hYž`X]Y`8Y`\]ž`X]di`f`i`bX`5`[`fU`i`a`ZUggh`i`bX`
_i`hi`fY`Y`<`Ø`Ydi`b`_hY`k`]Y`XUg`F`YX`:`cfh`c`XYf`XUg`C`VgYfj`Uhc]f]i`a`
j`cb`X]di`f`V]YhYh`"

9]b`k`Y]hYfYf`F`Y]n``Y[`h]b`XYb`i`bYfk`UfhYhYb`6Y[`Y[`bi`b[`Ybž`X]Y
gc`WY`:`U`fhYb`a`]h]g]W`Vf]b[`Yb``C`V`Y]bY`gdcbhUbY`F`_gWU!:`U`fh
j`ca`6U`b`b`c`Z`ni`Y]bYa`j`YfghYW`hYb`HYa`dY`k`]Y`XYa`6fU`a`U!
HYa`dY``]b`Di`g`_Uf`c`XYf`XYf`5bV`]W`_j`cb`9`Y`ZUbhYb`i`bX`?`Ø`Ybž
X]Y`[`Ya`ÅW`]W`X]Y`:`Y]gY`_fYi`nYb`i`Y`XYf`A`ca`Ybh`V]f[`h`Y]bY
bYi`Y`,`VYffUgW`i`b[``GØX]bX]Yb`k`]YXYfi`a`c`W`_h`a`]h`XYf`F`ci`hY
XYg`;`c`XYb`7`Uf]chž`X]Y`j`cb`6Ub[`U`cfY`Ui`g`Xi`fW`X`Yb`6UbX]di`f`
B`Uh]cb`U`d`Uf`_ZØ`f`hž`j`cfVY]`Ub`XYb`HYa`dY`b`j`cb`<`Ua`d]`V]g`ni`XYb
Ghf`ÅbXYb`j`cb`;`cU``8]Y`J`]Y`ZU`h`XYf`@UbXgW`UZhYb`i`bX`?`i`hi`fYbž
X]Y`a`Ub`Ui`g`XYa`Ni`[`ZYbghYf`Yf`YVhž]gh`_Ui`a`ni`ØVYfV]YhYb`"

8]Y`VYghY`NY]hž`i`a`X]YgYg`5VYbhYi`Yf`ni`k`U[`Ybž``Y[`h`nk`]gWYb
C`_hcVYf`i`bX`A`Åfnž`k`Ybb`XUg`?`]a`U`Ub[`YbY`a`a`]X`]gh`i`bX`X]Y
<]hY`XYg`Gca`a`Yfg`k`Y]W`h``#`X]YgYf`NY]h`YfghfU`Yb`Gh`Å`hY`k`]Y

I XU]di fž'cZhiU`g' J YbYX][`XYg'C ghYbg `VYnY]WbYhž]b'j c`Yf
DfUW h'ink]gWYb'XYb'GYb': UhY\`GU[Uf'i bX'D]Wc`U"5i W'8Y`\]
`cW_h'a]h'gY]bYb'6UgUfYb'k]Y`XYa `7\UbXb]'7\ck _i bX
\]ghcf]gWYb'GhÅhhYb'k]Y`XYa `ϕX]U; UhYž'k Å\fybX'?U`_i hhU'a]h
XYa `A U]XUb'Duf_`i bX'gY]bYb'H\YUHyfb'Y]bYb'[Ubn'Y][YbYb
7\Ufa Y'j YfgdfØ\h"K Yf'ϕgd]fUh]cb'ZØf'j bX]j]Xi Y`Y`F ci hYb'gi W hž
Z]bXYh'VY]'6U\ b fY]gYb"XY`k Yfhj c`Y`H]ddg'i bX'6YfUhi b[`ni
a U» [YgWbY]XYfhYb'FY]gYb'cXYf'; fi ddYbUb[YVchYb"

8cW`Yg'g]bX`b]W h'bi f`X]Y`N]Y`YžX]Y`Y]bY`Ni [fY]gY`]b`ϕX]Yb`gc
VYgcbXYfg'a UWYb"9g]gh'XUg; YZØ\`ž'HY]'Y]bYg'[fØ» YfYb
; UbnYb'ni `gY]bž'Y]b[YVYhhYh]b'XYb'F \m\ a i g'Y]bYg'@UbXYgž'XUg
b]Ya U`g'gh]`ghY\h'ϑXY': U\fhž'cV`Xi fW`X]Y`K ØghY`H\Uf'cXYf
YbhUb[`XYf'? UZZYd`UbhU[Yb'GØX]bX]Ybgž'ØZbYh'Y]b`bYi Yg
?Ud]hY`j c`Yf'9]bXfØW_Yž'X]Y`Ub[Y`bUWk]f_Yb"

8]Y`J]Y`ZU`h`XYf`]bX]gWYb`6U\ b\ ØZY`



?Ui a `Y]b`C fh]b`ϕX]Yb`gd]Y[Y`h'X]Y'; YgW]W hY'i bX'XYb'Di `g'XYg
@UbXYg'gc`Y]bXfi W_gj c`k]XYf'k]Y`gY]bY`6U\ b\ ØZY`
a cbi a YbhU`Y`NYi [Yb'XYf'J Yf[Ub[Yb\Y]hi bX`W Uch]gWY
?bchYbdi b_hY`XYg'a cXYfbYb`@YVYbg"8]YgY`UfW]hY`hcb]gWYb

A Y]ghYfk Yf_Y]g]bX'cZn'XYf'YfghY'9]bXfi W_ž'XYb'FY]gYbXY'j cb
Y]bYf'GhUXh'[Yk]bbYbž'i bX'g]Y'YfnÀ\`Yb'; YgW]W hYb'j cb
?c`cb]U'nY]hž'i bUV\`Àb[][_Y]h'i bX'_i `hi fY`Yf'J]Y`ZU'h"9]b'; Ub[
Xi fW`X]YgY'<U`Yb']gh'k]Y'Y]bY'NY]hfY]gYž'VY]'XYf'YXYf'GhY]b'i bX
YXY'GÀi`Y'j cb'Y]bYf'UbXYfYb'9dcW]Y'ZØghYfh"

9]bYf'XYf'VYY]bXfi W_YbXghYb'J YfhfYhYf']gh'XYf'7\`UhfUdUh]
G\]j U^]A U\UfU^HYfa]bi g]b'A i a VU]ž ZfØ\Yf'VY_Ubbh'U`g'J]Wfc]U
HYfa]bi g"8]YgYg'I B9G7C!K Y`h_i `hi fYfVY'j YfY]bh'[ch]gW]Y
9`Ya YbhY'a]h]bX]gW]Yb'9]bZØggYbž'Y]b'Gma Vc`XYf'Vf]h]gW]Yb
?c`cb]U`YffgW]Užž'XUg`%, , +ZYfh][[YghY`h'k i fXY"8]Y
_i bghj c`Yb'HØfa W]Ybž'6i bh[`UgZYbghYf'i bX'X]Y'ja d'cgUbhY
?i ddY'a UW]Yb'XYb'6U\`b\`cZni`Y]bYa`UfW]hY_hcb]gW]Yb'ž k Y`ž
XUg'hÀ[`]W`HUi gYbXY'j cb'DYbX'Yfb'i bX'FY]gYbXYb'Ya dZÀb[h"
K Yf'\]Yf'Ub_ca a hž'gdØfh'gcZc'fh'XYb'Di`g'XYf'GhUXhž'X]Y'b]Ya U`g
gW`ÀZž'k À\`fYbX'NØ[Y'j b'U`Y'F]W]hi b[Yb'XYg'@UbXYg'UVZU\`fYb"

≠'8Y`\]k]YXYfi a`h\`fcbh'XYf'BYk'8Y`\]F U]`k Um'GhUh]cb'U`g
a cXYfbYf'?cbhfUgh'ni`XYb'\]ghcf]gW]Yb'GhÀhYb'XYf'<Ui dhghUXh"
5`g'Y]bYf'XYf'[YgW]ÀZh][ghYb'6U\`b\`ØZY`≠X]Ybg'VYX]YbhYf'XUg
gc[YbUbbhY'; c`XYbY'J]YfYW_ž'XUg'8Y`\]a]h'?c`_UhUž'7\`YbbU]
i bX'A i a VU]j YfV]bXYh"8]Y'5fW]hY_hi f'a U[`k Yb][Yf'cdi`Ybh
k]f_Yb'U`g]b'A i a VU]ž XcW`X]Y'gW]YfY'; fØ»Y'i bX': i b_h]cbU']hÀh
XYg'?ca d`YI Yg'VYY]bXfi W_Yb"A]h'ØVYf`%*`; `Y]gYb'i bX'Y]bYf
ghÀbX][Yb': i h'Ub'FY]gYbXYb']gh'Yf'Y]b'A]_fc_cga cg'XYg
]bX]gW]Yb'@YVYbg'`W]Uch]gW]ž'YVYbX][`i bX'j c`Yf'9bYf[]Y"
8YhU]`Y]YfhY`≠Zcfa Uh]cbYb'ni`XYb'J YfV]bXi b[Yb'i bX'XYf
6YXYi hi b[`gc`W]Yf'?bchYbdi b_hY'Z]bXYb'g]W]Ui ZK]_]dYX]Už'k c
X]Y'; YgW]W hY'XYg]bX]gW]Yb'GW]YbYbj Yf_Y\`fg'i a ZUggYbX
Xc_i a Ybh]Yfh]gh"

K Y]hYf'ja`C ghYbž'j b'?c`_UhUž'Yf\`YVh'g]W]XYf'<ck fU\`ž bW]cb
F U]`k Um'GhUh]cb'U`g'Y]b'k Y]hYfYg'UfW]hY_hcb]gW]Yg'K U\`fnY]W]Yb"
A]h'gY]bYb'&'`; `Y]gYb'nÀ\`h'Yf'ni`XYb'[fØ»hYb'6U\`b\`ØZYb'XYg
@UbXYg'i bX']gh'gY]h'gY]bYf'9fØZZbi b[`%) (`Y]b'Hcf'ni`C gh]bX]Yb"
8]Y'fchY'6UW_g]hY]bZUggUXY'i bX'X]Y'bYc`_Ugg]n]gW]Yb'9`Ya YbhY
j Yf'Y]\`Yb']\`a`Y]bY'NY]h'cgY'9`Y[Ubž'k À\`fYbX'X]Y'VYfØ\`a hY
<ck fU\`!6fØW_Y]b'XYf'BÀ\`Y'XUg'6]'X'_ca d`Yhh]Yfh'<]Yf'VY[]bbYb

cXYf`YbXYb`F Y]gYb`]b`X]Y`gd]f]hi Y`Yb`NYbhfYb`k]Y`J UfUbUg]`cXYf
]b`X]Y`[fØbYb`<Ø[Y`j cb`8Uf`YY`]b[ži bX`XYf`6U\b\cZ`gY`Vgh
gWXY]bh`X]Y`A Y`UbW`c`Y`i bX`i: fYi XY`XYf` GhUXh`XYf`i: fYi XY
k]XYfni gd]Y[Y`b"

⇒a`GØXYb`ϕX]Ybg`Z`h`XYf`7\YbbU]`7YbhfU`F U]`k Um`GhUh]cb`Xi fW
gY]bY`a Uf`UbhY`5fW`]hY`_hi`f`Ui`Z`X]Y`YVYbZU`g`Ui`g`XYf
?c`cb]U`nY]h`ghUa`a`h`9fVUi`h]a`ϕ\`f`%,`+`i`bX`gd`ÅhYf`]a`]bXc!
gUfUnYb]gWXYb`Gh]`Yfk`Y]hYfhž`VYY]bXfi`W`h`XYf`6U\b\cZ`a`]h
gY]bYa`_`c`Yb`Hi`fa`i`bX`XYb`fchYb`GUbXghY]ba`Ui`Yfb`9f`X]Ybh
U`g`5i`g[Ub[gdi`b`_h`ZØf`F Y]gYb`Ybh`Ub[`XYf`?ØghY`cXYf`]b`X]Y
HYa`dY`gh`ÅXhY`HUa`]`B`UXi`g`i`bX`]gh`Y]b`YVYbX][`Yg`6Y]gd]Y`XU`ZØfž
k]Y`5fW`]hY`_hi`f`X]Y`_i`hi`fY`Y`J`YfgW`a`Y`ni`b[`]b`ϕX]Yb
k]XYfgd]Y[Y`h`8]Y[Y`gW`ÅZh][`Y`5ha`cgd`\`ÅfYž[`YdU`Ufh`a`]h`XYa
\]ghc`f]gWXYb`i: `U]fž`a`UW`h`YXY`5b`_i`b`Zh`cXYf`5V`ZU`fh`ni`Y]bYa
9f`YVb]g"

B]W`h`ni`j`Yf[YggYb`g]bX`_`Y]bYfYž`UVYf`YVYb`gc`ZUgn]b]YfYbXY
6U\b\ØZ`k]Y`XYf`]b`@`W`bck`ž`XYf`7`UfVU[`\`F U]`k Um`GhUh]cb`A`]h
gY]bYf`A`]gW`i`b[`Ui`g`A`i`[`\`U`!`i`bX`F`U`di`h]5fW`]hY`_hi`fž[`Ydf`Å[`h
j`cb`?`i`ddY`b`i`bX`6Ø[`Ybž`k]f`_h`Yf`k]Y`Y]b`DU`Ugh`Ui`g`Y]bYf
j`Yf[Ub[YbYb`Ÿ`fU`9fVUi`h]b`XYb`%`-`&\$Yf!`ϕ\`fYbž`j`YfV]bXYh`Yf`X]Y
GhUXh`a`]h`XYa`F`Ygh`B`cfX]bX]Ybg`i`bX`V]YhYh`Y]bYb`fi`_\][`Yb
;`Y[`Ybdc`ni`XYb`_`Y`_h]gWXYb`i: `fc»`ghUXhV`U\b\ØZ`b`"Gc`W`Y`C`fhY
nY][`Ybž`XUgg`gY`Vgh]b`XYf`i: `i`b`_h]cbU`]h`Åh`Y]bYg`6U\b\cZ`g`X]Y
]bX]gWXY`@]YVY`ni`a`8`YhU]`i`bX`ni`f`Ÿ`gh`Yh]`_`b]W`h`j`Yf`cfYb`[`Y`\`h"

8]YgY`6U\b\ØZ`g]bX`a`Y`\`f`U`g`bi`f`8i`fW`[`Ub[`gghUh]cbYb`/`g]Y`g]bX
_i`hi`fY`Y`?`bchYbdi`b`_hYž`X]Y`X]Y`J`Y`ZU`hi`bX`i: `YgW`]W`hY`ϕX]Ybg
]b`]fYb`A`Ui`Yfb`VYk`U`fYb`"ϕ`XYf`j`cb`]bYb`hf`Å[`h`Y]bY`Y][`YbY
<`UbXgW`f]Zhž[`Ydf`Å[`hj`cb`XYf`F`Y[]cb`i`bX`XYf`NY]hž]b`XYf`Yf
YbhghUbX`"K`Ybb`a`Ub`Xi`fW`]fY`<`U`Yb`_`Åi`Zhž`j`cfVY]`Ub`<`ÅbX`Yfbž
X]Y`7`U]i`bX`GbUW`_g`UbV]YhYbž`k]fX`_`Ufž`XUgg`\]Yf`b]W`h`bi`f
NØ[`Yž`gcbXYfb`Ui`W`i: `YgW`]W`hYb`Ui`Z]\`fY`5V`ZU`fh`k`UfhYb`"

Ni [hmdYb`i bX`?`UggYb



K Yf`]b`ϕX]Yb`a]h`XYa`Ni [`fY]ghž`VYhf]hh`Y]bY`K Y`h`j c`Y`f
C dh]cbYbž`X]Y`gc`Vi bh`i bX`j]Y`Z`A`h[]`gh`k]Y`XUg`@UbX`gY`Vgh" J cb
cdi`Yb`hYb`@ I i gnØ[Ybž`X]Y`Ub`_Øb][`]W`X`DU`ÀghY`Yf]bbYfbž`V]g
\\b`ni`Y]bZUW`Yb`c`_U`Yb`J Yfv]bXi b[Ybž`X]Y`XUg`F ØW_[fUh`XYg
hÀ[`]W`X`Yb`@YVYbg`V]`XYbž`V]YhY`h`XUg`GW`X]YbYbbYhn`ZØf`Y`XYb
; YgW`a`UW`i bX`Y`XYg`6i X[Yh`Y]bY`dUggYbXY`A Ø[`]W`_Y]h`8]YgY
6UbXVfY]hY`Ub`Ni [hmdYb`i bX`?`UggYb`gd]Y[Y`h`b]W`h`bi`f`X]Y
gcn]U`Y`J]Y`ZU`h`k]XYfž`gcbXYfb`Ui W`X]Y`i bhYfgW`X]Y`W`X`Yb
6YXØfZb]ggY`XYf`F Y]gYbXYbž`X]Y`hÀ[`]W`X`A`J`]cbYb`?`]`ca`YhYf
ni fØW`_Y[Yb"

5b`XYf`Gd]hnY`XYg`?ca`Zcfhg`ghY`Yb`X]Y`@ I i gnØ[Y`k]Y`XYf
A U\UfU`Ug`9l dfYgg`cXYf`XYf`DU`UW`c`b`K`\\Y`gž`X]Y`Y]bY`F Y]gY`]b
X]Y`J Yf[Ub[Yb`Y]h`XYf`]bX]gW`Yb`: ØfghYb`\\Ài`gYf`Yfa`Ø[`]W`Yb"
8]YgY`fc`Y`bXYb`DU`ÀghY`V]YhYb`_`]a`Uh]g]YfhY`? UV]bYb`a]h`d`f`j`UhYb
6ÀXYfbž`ZY]bghY`; Ughfcbca`JY`i bX`dYfgØb`]W`X`Yb`GYfj`]W`ž`XYf`_Y]bY
K ØbgW`Y`c`ZYb`Àggh" F ci`hYb`ZØ`fYb`c`Zi`Xi`fW`X]Y`_i`hi`fY`Y`b
< Ø`Y`di`b`_`hY`F`U`Ugh`Ubg`c`XYf`j`Yfv]bXYb`A`Yhfc`dc`Yb`k`JY`A`i`a`VU]
i`bX`8Y`\\]`a`]h`a`U`Yf]gW`X`Yb`C`fhYb`k`JY`I`XU]di`f`Gc`W`X`Y`NØ[Y`g]bX
]XYU`ZØf`F Y]gYbXYbž`X]Y`; YgW`]W`hY`i bX`@ I i g`]b`Y]bYa`5hYa`ni [Y
Yf`YVYb`a`ØW`hYbž`i bX`V]YhYb`c`Zi[YZØ`f`hY`5i`gZØ[Y`ni
GY`Y`b`gk`ØfX][`_Y]hYb`k`JY`XYa`HU`^A`U`U`Ub"

9]bYb`GW f]hXUfi bhYf`fUb[]YfYb`X]Y` : YfbnØ[Y`XYf` ðX]Ub
FU]`k Umgž`X]Y`XUg`@UbX`]b`U`Y`<]a a`Y`gf]W`hi b[Yb`Xi fW`n]Y`Yb`
<]Yf`[]Vh`Yg`Y]bY`VfY]hY`DU`YhhY`Ub`?`UggYbž`X]Y`g]W`bUW`?ca`Zcfh
i bX`DfY]g`ghUZZY`b`"8]Y`57` :]fgh`7`Ugg`f%5Ł`V]YhYh`df]j`UhY`5VhY]`Y
a`]h`6YhhYbž`?`]a`UUb`U[Y`i bX`6Yh`k`ĀgW`Y` `Y]bY`_ca`ZcfhUV`Y
K`U` `ZØf`Ub[Y`GhfY`W`Yb`"8]Y`57`&!H]Yf`f&5Ł`i bX`57` `!H]Yf`fi`5Ł
?`UggYb`g]bX`YVYbZU`g`_]a`Uh]g]Yfhž`V]YhYb`UVYf`k`Yb][`Yf
Df]j`Uhgd`ĀfYž`XU`X]Y`5VhY]`Y`a`]h`J`cf`Āb[Yb`cXYf`cZYbYb
@]Y[Yd`ĀhnYb`Ui`g[YghUhhY`h]g]bX`"8]YgY`C`dh]cbYb`g]bX`VY]
FY]gYbXYb`VY`]YVhž`X]Y`Y]bY`6U`UbW`nk`]gW`Yb`6Yei`Ya` `]W`_Y]h
i bX`?`cghYb`gi`W`Ybž`i bX`Y][`bYb`g]W`VYgcbXYfg`ZØf`B`UW`hZU`fhYb
nk`]gW`Yb`GhĀXhYb`k`]Y`8Y`\\]i bX`J`UfUbUg]"

: Øf`Y]b`Ui`h`Yb]g]W`YfYg`9f`YVb]g`[fY]ZYb`j`]Y`Y`ni`f`G`YYdYf`7`Ugg
fG@Ł`X]Y`b]W`h`_]a`Uh]g]Yfh`]ghž`XU`ZØf`UVYf`[Øbgh][`i bX`j`c`Yf
@YVYb`" <]Yf`hY]`h`a`Ub`g]W`c`ZYbY`5VhY]`Y`a`]h`V]g`ni`g`YW`g
DYfgcbYbž`k`Ā`fYbX`J`Yb]h`Uhc`fYb`ZØf`Yhk`Ug`5V`_Ø`\\i b[`gcf[Yb`
8]Y` : YbghYf`g]bX`c`Zh`c`ZYbž`k`Ug`XYb`6`]W`_Ui`ZX]Y`j`cfVY]n]Y`YbXY
@UbXgW`UZh`i bX`XYb`5i`ghUi`gW`a`]h`A`]hfY]gYbXYb`Yf`Y]W`hYfh` `gY]
Yg`ØVYf`Y]bYb`6YW`Yf`7`\\U]`c`XYf`Y]bY`8]g`_i`gg]cb`ØVYf`XUg
bĀW`ghY`FY]gYn]Y`"8]YgY`?`UggY`]gh`XYf`<YfngW`U[`XYg`]bX]gW`Yb
Ni`[fY]gYbgž`k`c`a`Ub`XYb`Di`g`XYg`5`hU[g`\\Ui`hbU`gdØfh"

BcW`k`Y]hYf`i`bhYb`]b`XYf`<]YfUfW`]Y`ghY`h`X]Y` ; YbYfU`7`Ugg`fi`F
`I`bfYgYfj`YXŁ`X]Y`[Øbgh][`ghY`C`dh]cbž`VY]`XYf`_Y]bY
G]hnd`UhnfYgYfj`]Yfi`b[`a`Ø[`]W`_]gh`" <]Yf`\\YffgW`h`c`Zh` ; YXfĀb[Yž
VYgcbXYfg`Ui`Z`ghUf`_ZfYei`Yb]h]YfhYb`GhfY`W`Ybž`i bX`?`ca`Zcfh`ghY`h
\\]bhYb`Ub`"8Yb`bcW`_]gh`g]Y`ZØf`j`]Y`Y` ðXYf`X]Y`Y]bn][`Y
YfgW`k`]b[`]W`Y`A`Ø[`]W`_Y]hž`k`Y]hY`8]ghUb`nYb`ni`ØVYfVfØW`Ybž
i bX`ZØf`UVYb`hYi`Yf`i`gh][`Y`FY]gYbXY`Y]bY`7`\\UbW`ž`XUg`YW`hY
ðX]Yb`c`\\bY` :]`hYf`ni`Yf`YVYb`"5i`Z`_i`fnYb`GhfY`W`Yb`c`XYf`]b
J`c`f`c`f`h`Ø[Ybž`k`]Y`g]Y`]b`A`Yh`f`c`d`c`Yb`k`]Y`A`i`a`VU]j`Yf`_Y`\\fYbž`g]bX
X]YgY`K`U[[`cbg`c`Zh`ØVYfZØ`hž`UVYf`g]Y`nY][`Yb`X]Y`i`bVĀbX][`Y
9bYf[]Y`XYg`@UbXYg"

B`YVYb`X]YgYb`?`UhY[`cf]Yb`[]Vh`Yg`Ui`W`gdYn]Y`Y`NØ[Y`k`]Y`X]Y
G`\\UhUVX]`9i`dfYgg`c`XYf`F`U`X`\\Ub]`9i`dfYggž`X]Y`ZØf`GW`bY`][`_Y]h
i bX`9ZZ]n]Ybn`ghY`Yb`"8]YgY`_]a`Uh]g]YfhYb`9i`dfYggnØ[Y

j YfV]bXYb' [fc»Y' GhÀXhY' k]Y' 8Y' \ž' A i a VU]i bX' ?c' _UhU'a]h
a]b]a U'Yb' < U'hYghY''Yb' i bX' V]YhYb' A U\`nY]hYb' Ub' 6cfX" G]Y' g]bX
Y]bY' VY']YVhY' K U\`ZØf'; YgWÀZhgfY]gYbXY' cXYf' YbYž' X]Y' Ub [Y
8]ghUbnyb']b' _ØfnYfYf' NY]h' ni fØW_ Y [Yb' a ØW hYb'": Øf' XYhU]'']YfhY
=Zcfa Uh]cbYb' ni 'XYb' j YfgWÀ]YXYbYb' Ni [hmdYb' i bX' XYfYb
J YfZØ [VUf_ Y]h' c\ bh'g]WÀ' Y]b' 6']W_ 'Ui Z =bX]U' Gca YXUmž' k c' Ui WÀ
Ya dZc\`YbY' F ci hYb' i bX' 6i WÀ i b [gh]ddg' ni 'Z]bXYb' g]bX"

æ 'BU\j Yf_Y\`f' k]YXYfi a 'Xca]b]YfYb' FY []cbU'nØ [Y' i bX
J cfcfhVU\`bYbž' X]Y' GhÀXhY' a]h' i a `]Y [YbXYb' 8 ØfZYfb' j YfV]bXYb
cXYf' DYbX' YfghfØa Y']b' 6U' i b [gfÀi a Yb' VYk À' h] [Yb' 6YgcbXYfg']b
A i a VU]g]bX' X]Y' @cWU'`HfU]bg' 'Y]bY' @YVYbgUXYfž' X]Y' hÀ [`]WÀ
A]''cbYb' hfUb'gd'cfh]YfYb' "8]YgY' NØ [Y' g]bX' cZh'gdUfhUb]gWÀ ž' UVYf
i bj Yfn]WÀ hVUfž' i bX' V]YhYb' Y]bYb' 9]bV']W_]b' XYb' 5' `hU ['XYf
UfVY]hYbXYb' 6Yj Ø_ Yfi b ["C V' a Ub' bi b']b' Y]bYa' '@ I i gni ['Xi fWÀ
X]Y' K ØghY' F U'Ugh\ Ub'g ['Y]hYh'cXYf']b' Y]bYa' ØVYfZØ`hYb' J cfcfhni [
X]Y' ?ØghY' Yb' h'Ub [ZÀ\`fh' 'YXY': U\`fh'\Uh']\fYb' Y] [YbYb' 7\`UfU_hYf"

8]Y' K U\`XYg' Ni [Yg' i bX' XYf' ?`UggY' \Àb [h' Yhnh']WÀ' j cb' XYb
dYfgØb']WÀ Yb' J cf']YVYb' i bX' XYa' 6i X [Yh' UVž' XcWÀ' Y]bYg' V' Y]Vh
[`Y]WÀ' :>XY' C dh]cb' ØZbYh' Y]bY' HØf' ni 'Y]bYa' Ub' XYfYb' =bX]Yb"
K À\`fYbX' X]Y'; `Y]gY' i bhYf' XYb' F ÀXYfb' XU\]b' fUi gWÀ Ybž' k]fX
gWÀ bY' `` _Ufž' XUgg' X]Y' F Y]gY' gY' Vgh' cZh' [YbUi gc' ZUgn]b]YfYbX']gh
k]Y' XUg' N]Y' ž' XUg' Ua' < cf]ncbh' k UfhYh"

6Y']YVhY' Ni [ghfYW_Yb



9]b`Y]gYg`F UhhYfb`VY[`Y]hYh`X]W ž`k Å`fYbX`XYf`Ni [`g]W`gY]bYb
K Y[`Xi fW`X]Y`i bYbX`]WYb`K Y]hYb`bX]Ybg`VU`bhž`i bX`j cf`XYa
: YbghYf`k YW`gY`b`g]W`UhYa VYfUi VYbXY`GnYbYb`UV`k]Y`]b`Y]bYa
:]`a ž`XYf`b]Y`YbXYh`8]Y`GhfYW`Ybž`X]Y`XUg`@UbX`Xi fW`n]Y`Ybž`g]bX
b]W`h`bi f`J YfV]bXi b[Yb`nk]gW`Yb`C fhYbž`gcbXYfb`Ui W`DZUXY
Xi fW` ; YgW]W`hYž`?i `hi f`i bX`BUhi fk i bXYf``9]b][Y`X]YgYf`F ci hYb
`UVYb`g]W`U`g`k U`fY`DYf`Yb`ZØf`F Y]gYbXY`YhUV`]Yfhž`X]Y`b]W`h`bi f
Ub`_ca a Ybž`gcbXYfb`i bhYfk Y[g`ghUi bYb`a ØW`hYb``:XY` : U`fh
j Yfgdf]W`h`Y]bn][Ufh][Y`9]bXfØW`Yž`X]Y`g]W`h]YZ`]bg` ; YXÅW`hb]g
Y]bdfÅ[Yb`"

9]bY`XYf`VY`_UbbhYghYb`F ci hYb`ZØ`fh`Xi fW`XUg`<Yfn`BcfX]bX]Ybgž
cZi`U`g` ?`Ugg]gW`Yg`BcfX]bX]Yb`cXYf` ; c`XYbYg`8fY]YW`
VYnY]W`bYhž`i bX`j YfV]bXYh`8Y`\\]ž`5[fU`i bX`>]di f``5i ZX]YgYf
GhfYW`Yž`X]Y`g]W`]XYU`a]h`BUW`h`i bX`HU[YgnØ[Yb`_ca V]b]YfYb
`Ågghž`YfV`]W`h`a Ub`_i `hi fY`Y`GW`ÅhY`k]Y`XUg`HU`^A U`U`]b`5[fUž
Y]b`A cbi a Ybh`XYf`@]VYž`XUg`]a`A cf[Yb`]W`h`gW`]a`a Yfh`K Y]hYf
[Y`h`Yg`bUW`>]di fž`k c`XYf`DU`Ugh`XYf`K]bXY`a]higY]bYb
Z`][fUbYb` : UggUXYb`VYY]bXfi W`hž`VYj cf`a Ub`]b`8Y`\\`]b`XYb
Hfi VY`XYf`<Ui dhghUXh`Y]bhUi W`h`8]Y`@UbXgW`UZh`XUnk]gW`Yb
nY][h`k Y]hY`9VYbYb`i bX`8ØfZYfž`X]Y`Y]bYb`<Ui W`j cb`5`hU[`ZYfb
XYf`Hci f]ghYbdZUXY`j Yfa]hY`b`"

; cUž'a]h'Y]bYa '5VghYWX Yf'ni 'XYb'? UZZYd`UbhU[Yb'i bX`HYa dY`b
j cb`<U`YV]X"8]YgY`GhfYW_Y`nY][h'X]Y`J]Y`ZU`h'XYg`GØXYbg` j cb
Ødd][Yb`K `À`XYfb`V]g`ni `c`cb]U`Yb`?]fWX Yb` i bX`V]YhYh'9]bV`]W_Y
]b`Y]bY`F Y []cbž`X]Y`cZh]a `GWX UhhYb`XYg`hci f]gh]gWX Yb`BcfXYbg
ghY`h": Øf`XYhU]`]YfhY`6YgWX fY]Vi b[Yb`gc`WX Yf`F ci hYb`i bX
dfU`_h]gWX Y`H]ddg`ni f`D`Ubi b[`c`b`h`g]WX`Y]b`6`]W`Ui Z`**X]U**
Gca YXUmž`k c`ZØbZ`Ya dZY`Y`Ybgk YfhY`GhfYW_Yb`Ui gZØ`f`]WX
j cf[YghY`h`k YfXYb"

9]bY`VYgcbXYfY`9fk `À`bi b[]j YfX]Ybh`Ui WX`X]Y`GhfYW_Y]j cb`8Y`\
bUWX`5a f]hgUfž`X]Y`_i`hi fY`Y`i bX`fY`][]ØgY`<Ø`Ydi b`hY
j YfV]bXYh`8Yf'; c`XYbY`HYa dY`]b`5a f]hgUfž`XUg`gd]f]hi Y`Y
NYbhfi a`XYf`G]_`gž`Yi WX hY`h`k]Y`Y]b`š`k Y`]ba]hYb`XYf`GHUXž
k `À`fYbX`X]Y` : U`fh`Xcfh`]b`Xi fWX`X]Y`Zfi WX hVUfYb`9VYbYb`XYg
Di b`UV`ZØ`fh`8]YgY`F ci hY`ž`cZh]b`_i fnYb`HU[YgYhUddYb
UVgc`j]Yfhž`nY][h`Y]bY`UbXYfY` : UW`hY`BcfX]bX]Ybgž`[Ydf`À[hij cb
`UbXk]fhgWX UZh]WX Yf': Ø`Y`i bX`Y`fn`]WX Yf'; UghZfYi bXgWX UZh"

→XY`X]YgYf`GhfYW_Yb`Yfn`À`h`Y]bY`Y][YbY` ; YgWX]WX hY`ž`[Yk YVh`Ui g
XYb`@UbXgWX UZhYb`i bX`?i`hi fYbž`X]Y`g]Y`Xi fWX ei YfYb`"K `À`fYbX
XYf`Ni [`ØVYf`X]Y` ; `Y]gY`fc`hž`k]fX`XUg` : YbghYf`ni f`6Ø`bYž`Ui Z`XYf
g]WX`XUg`k U`fY`**X]Yb`]b`U`gY]bYb` : UW`hYb`nY][h`Y`Y]b
GWXUi gd]Y`ž`XUg`a]h`YXYa`?]`ca YhYf`bYi Y`5`hY`Ybh`Ø`h"**

F Y]gYj cfVYfY]hi b[`i bX`6i WX i b[



6Yj cf'X]Y'; `Y]gY'i bhYf'XY]bYb': Ø» Yb'j]Vf]YfYb'i bX'XYf'8i Zhj cb
7\U]X]Y'@ Zh'YfZØ`hž'VY[]bbh'YXY'Ni [fY]gY']b' ðX]Yb'a]h'Y]bYa
YbhgW\Y]XYbXYb'GWf]hh'XYf'D'Ubi b["'8]YgYg'5VYbhYi Yf'a U[
gdcbhUb'k]f_Ybž'XcW\Y]b'k Yb]['JcfVYfY]hi b['_Ubb'XYb
I bhYfgW\]YX'nk]gW\Yb'7\Ucg'i bX'i bj Yf[Ygg`]W\Yb'A ca YbhYb
Ui ga UW\Yb"'Jcb'XYf'K U\`XYf'f]W\h][Yb'Fci hY'V]g'\]b'ni f
6i W\i b['XYf'H]W_Yhg' 'a]h'XYb'dUggYbXYb'K Yf_nYi [Yb'i bX'Y]b
dUUf'dfU_h]gW\Yb'<]bk Y]gYb'k]fX'X]Y'c f[Ub]gUh]cb'ni a
?]bXYfgd]Y'ž'gY'Vgh]'b'Y]bYa '@UbXž'XUg'ZØf'gY]bY'i bj cf\YfgY\VUFY
@YVYbX][_Y]h'VY_Ubbh]gh"

8Yf'YfghY'GWf]hh']gh'X]Y'5i gk U\`XYf'F Y]gYnY]hž'XYbb'XUg'?`]a U
gd]Y'h'Y]bY' [fc» Y'F c`Y'ZØf'XYb'?ca Zcfh'i bhYfk Y[g"'8]Y'A cbUhY
nk]gW\Yb'c_hcVYf'i bX'A Åfn'V]YhYb'a]'XY'HYa dYfUhi fYbž']XYU'
ZØf'Ub[Y': U\fhYb'i bX'9f_i bXi b[Yb'Ub'XYb'Nk]gW\Ybghcddg"' ð
X]YgYf'NY]h'g]bX'VY']YVhY'Fci hYb'k]Y'XUg'; c'XYbY'8fY]YW_ 'j cb
8Y'\]ØVYf'»J]di f'V]g'5[fU' 'VYgcbXYfg'Ub[YbY\ a ž'XU'X]Y'<]hY
XYg'Gca a Yfg'cXYf'X]Y': Yi W\h][_Y]h'XYf'A cbgi bnY]h'ZY\`Yb"'9g
'c\bh'g]W\ž'XYb'?U'YbXYf'ja '6`]W'ni 'VY\U'hYbž'XU']bX]gW\Y
: Y]YfhU[Y'k]Y'8]k U]'cXYf'<c']ni 'ØVYfZØ`hYb'NØ[Yb'i bX'\Ø\YfYb
DfY]gYb'ZØ\ fYb' _ØbbYb"

9]b'nYbhfU'Yf'Di b_h'VY]'XYf'D'Ubi b[']gh'X]Y'6i W\i b['XYf'H]W_Yhgž
i bX'\]Yf' []h'ZfØ\XfUb'gY]b'nU\`h'g]W\Ui g"'6YgcbXYfg'Ui Z'ghUf_
ZfYei Ybh]YfhYb'GhfYW_Yb'cXYf'VY]'@ I i gnØ[Yb'k]Y'XYa

A U\UfU'Ug '9I dfYgg'g]bX'D'ÀhnY'cZh'K cW\Yb'cXYf'A cbUHY'ja
J cfUi g'Ui g[YVi W'h"8]Y'cZZ]n]Y''Y'K YVgY]hY'XYf'ϕX]Ub'F U]'k Umg
fHf 7H7Ł'Yfa Ò['W'h'C b']bY!6i W'i b[Ybž'YfZcfXYfh'YXcW\Y]bY
FY[]ghf]Yfi b['i bX'a UbW\ a U''Yhk Ug; YXi 'X'Ui Z[fi bX'XYf'\c\Yb
BUW\ZfU[Y'' : Øf']bhYfbUh]cbU'Y'FY]gYbXY' []Vh'Yg'gdYn]Y''Y
?cbh]b[YbhYž'X]Y'gc[YbUbbhYb' Hci f]gh'E i chUg ž'X]Y'Ua '6U\ b\cZ
cXYf'ØVYf'FY]gYVØfcg[Ybi hnh'k YfXYb'_ØbbYb''5'hYfbUh]j 'V]YhYb
D'Uhhžcfa Yb'k]Y'%&; c'cXYf'A U_YA mHf]d'Y]bY
VYbi hnYfZfYi bX'W\Y'CVYfZÀW\Yž'i a 'J YfV]bXi b[Yb'ni 'gi W\Yb
i bX'ni 'fYgYfj]YfYb"

K Yf''YVYf'dYfgØb'W\Y'6YfUhi b['gi W'hž'Z]bXYh'VY]'gdYn]U'g]YfhYb
5bV]YhYfb'k]Y'6U\bfY]gYb"XY' i bhYfghØhni b["'<]Yf'k YfXYb
]bX]j]Xi Y''Y'FY]gYj Yf'Ài ZY'YfghY''hž'gY]Yg'ZØf'; fi ddYb'cXYf
9]bnY'fY]gYbXYž'i bX'a Ub'Yf\À'h'k Yfhj c''Y'H]ddg'ni 'Fci hYb'k]Y
XYa ' ; c'XYbYb'8fY]YW_cXYf'FY]gYb'Xi fW'F U'Ugh\Ub''8]Y
6YfUhi b['gh'VYgcbXYfg'\]'ZfY]W\ž'k Ybb'a Ub '@ | i gnØ[Y'cXYf
_ca d'YI Y'J YfV]bXi b[Yb'd'Ubhž'i bX'ghY'h'a cbhU[g'V]g'ZfY]hU[g
j cb'-. \$ \$'V]g'% , \$ \$'I \f'ni f'J YfZØ[i b["'5i W\c_U'Y'FY]gYVØfcg
j cf'C fh_ØbbYb'VY]'_i fnZf]gh][Yb'6i W'i b[Yb'cXYf'YbXYfi b[Yb
Y]bY'FYhhi b['gY]bž'cZh[Y[Yb'Y]bY'_Y]bY'; YVØ\ f"

9]b'k Y]hYfYf'i bj Yfn]W\hVUfYf'6Y['Y]hYf'g]bX'5ddgž'X]Y'XYb
, VYfV'W_Yf'Y]W\hYfb'' ϕ 7H7'F U]'7cbbYWh 'gh'X]Y'cZZ]n]Y''Y'5dd
XYf']bX]gW\Yb'9]gYbVU\ b'i bX'Yfa Ò['W'h'b]W'h'bi f'X]Y'6i W'i b[ž
gcbXYfb'Ui W\XUg'J YfZc'[Yb'j cb'Ni [ghUhi gi bX'J YfgdÀhi b[Yb']b
9W\hnY]hi 'Y]b'GY[Ybž'XU'DØb_h]W_Y]h'b]W'h']a a Yf'[UfUbh]Yfh]gh"
K \YfY']g'a m'HfU]b 'gh'Y]bY'k Y]hYfY'bØh'W\Y'5bk YbXi b[ž'X]Y
gY'Vgh'c\bY'ϕhYfbYhj YfV]bXi b['XYb'GhUbXcfh'Y]bYg'Ni [Yg
UbnY][hi bX' : U\fd'ÀbY'VYfY]h\À'h'' : Øf']bhYfbUh]cbU'Y'FY]gYbXY
V]YhYh' Hf]d5Xj]gcf 'cXYf' ; cc['Y'A Udg 'ni gÀhn'W\Y
ϕZcfa Uh]cbYb'ni '6U\ b\ÒZYb'i bX'bU\Y[Y'Y[YbYb
GY\Ybgbk ØfX][_Y]hYbž'i a 'Nk]gW\Ybghcddg'g]bbj c''ni 'bi hnYb"

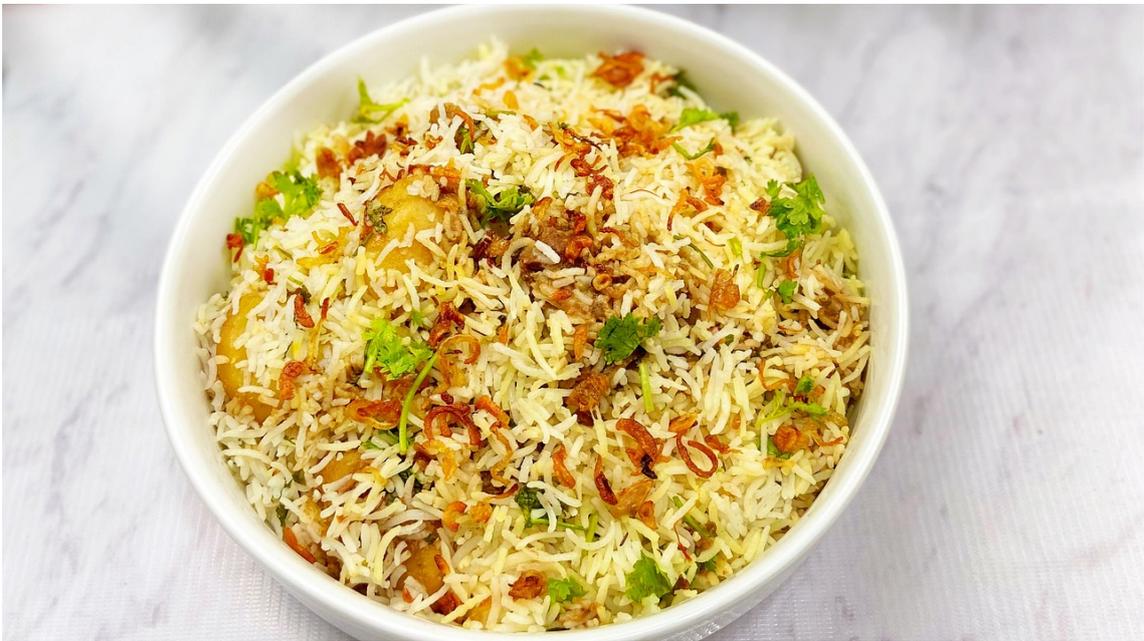
6Y]'XYf'K U\ 'XYf'? 'UggY'gc'hY'a Ub'6i X[Yhi bX'?ca Zcfh
UVk À[Yb'' : Øf''Ub[Y'GhfYW_Ybž'Yhk U'j cb'8Y'\]'bUW\ 'J UfUbUg]ž
g]bX'_]a Uh]g]YfhY'? 'UggYb'k]Y'57 '&!H]Yf'cXYf'57'' !H]Yf'Y]bY' [i hY
K U\ž'XU'g]Y'F i \Y'i bX'Y]b'A]bXYgha U» 'Ub'6Yei Ya 'W_Y]h

V]YhYb"K Yf_ØfnYfY'8]ghUbnYb'ni fØW_Y[h'cXYf'XUg'Ui h\Ybh]gWY
ÆX]Yb'Yf'YVYb'a ØW hYž'_Ubb']b'XYf'G'YYdYf'7`Ugg'cXYf'gc[Uf'XYf
; YbYfU`7`Ugg'fY]gYb'`U`YfX]b[g'gc`hY'a Ub'Ui Z; YXfÅb[Y'i bX
VY[fYbnhYb'D`Uhn'j cfVYfY]hYh'gY]b"9g'Ya dZ]Y\`h'g]Wž'VY]'XYf
6i W i b['X]Y'D`Uhn]Yfi b['ni `dfØZYbž'XU'cVYfY'@]Y[Yb']b
BUW hñØ[Yb'cZifi \][Yf'g]bX'U'g'i bhYfYž'X]Y'hU[gØVYf'U'g
G]hnd`ÅhY'[Ybi hnh'k YfXYb"

9]b'cZi'ØVYfgY\YbYf'H]dd']ghž'X]Y'J YfdZY[i b['ja '6`]W`ni `UVYb"
Æj]Y'Yb'NØ[Ybž'VYgcbXYfg]b'\Ø\YfYb'?`UggYb'k]Y'XYf'57':]fgh
7`Uggž'g]bX'A U\`nY]hYb']a 'H]W_YhdYfY]g'Ybh\U'hYbž'XcW'X]Y
E i U`]hÅh'_Ubb'j Uf]]YfYb"5i Z'XYb'6U\`b\ØZYb'i bX']b'XYb'K U[[cbg
j Yf_Ui ZYb'< ÅbX'Yf'GbUW_g'i bX'; YhfÅb_Y'k]Y'7\U]ž'k Ug'Y]bY
[Øbgh][Y'i bX'Ui h\Ybh]gWY'`C dh]cb'XUfghY`h"9g'gW UXYh'b]W hž
Y][YbY'K UggYfZUgWYb'i bX'_Y]bY'GbUW_g'a]hni Vf]b[Ybž'i a 'Ui Z
J YfgdÅhi b[Yb'cXYf'i bYfk UfhYhY'G]hi Uh]cbYb'j cfVYfY]hYh'ni 'gY]b"

Ni '[i hYf'@Yhnh'gc`hY'a Ub': `Yi]V]'hÅh'Y]bd`UbYbž'XYbb
J YfgdÅhi b[Yb'g]bX'_Y]bY'GY'hYb\Y]hž'VYgcbXYfg'Ui Z`Ub[Yb
GhfYW_Yb"9]b'Di ZZf'j cb'Y]b'dUuf'Ghi bXYb'VY]'5bgW`ØggYb'cXYf
k]W h][Yb'HYfa]bYb'_Ubb'GhfYgg'j Yfa Y]XYb"9VYb'gc`\]Zh'Ygž
k]W h][Y'8c_i a YbhY'k]Y'XYb'FY]gYdUgg'cXYf'X]Y
H]W_YhVYghÅh][i b['[f]ZZVYfY]h'ni `UVYbž'XU'?cbhfc`Yb'Ub
6U\`b\ØZYb'ØV`W'g]bX"A]h'X]YgYb'J cfVYfY]hi b[Yb']a ; YdÅW_
ghY\`h'Y]bYf'fY]Vi b[g'cgYb'FY]gY'b]W hg]a 'K Y[ž'i bX'XYf': c_i g
_Ubb'Ui Z'XUg'K YgYbh]WY'[Yf]W hYh'k YfXYb.'XUg'9f'YVb]gž'XUg
\]bhYf'YXYa '6U\`b\cZi bX'YXYf'?i fj Y'k UfhYh"

9ggYb' i bX'Hf]b_Yb'Ub'6cfX



Nk]gWYb`XYa`FUhYfb`XYf`GW`YbYb`i bX`XYa`gUbZhYb`GWUi`_Y`b
XYg`K U[[cbg`k Y`h`Y]b`j Yf`cW`YbXYf`8i Zh`Xi fW`XYb`Ni [`Y]bY
9]b`UXi b[ž`X]Y`_i` `]bUf]gWY`GY]hY`ϕX]Ybg`X]fY`_h`Ui ZXYf`FY]gY`ni
YbhXYW`Yb`"9ggYb`]b`]bX]gWYb`NØ[Yb`]gh`k`Y]h`a`Y`f`U`g`V`c`»Y
BU`fi b[gUi Zb`U`a`Y`/Yg`]gh`Y]b`: YbghYf`ni f`fY[]cbU`Yb`J]Y`ZU`hi bX
Y]b`F`hi U`ž`XUg`A]hfY]gYbXY`j YfV]bXYh`"J cb`XUa`dZYbXYa`7`U]ž
XYf`]b`_Y]bYb`6YWYfb`[YfY]W`h`k`]fXž`V]g`\\]b`ni`k`Øfn][Yb`GbUW`gž
X]Y`j cb`Z]b`_Yb`<AbX`Yfb`Ub[YVchYb`k`YfXYbž`j Yfk`UbXY`h`g]W
YXY`: U`fh`]b`Y]b`: Ygh`ZØf`XYb`; Ui`a`Yb`"

ϕ`XYb`\\Ø`YfYb`?`UggYbž`k`]Y`XYf`57`:]fgh`7`Ugg`cXYf`VY]
@ | i gnØ[Yb`k`]Y`XYa`A`U`UfU`Ug`9i`dfYggž`g]bX`A`U`nY]hYb`c`Zh`a
H]W`YhdfY]g`]bVY[f]ZZYb`i bX`V]YhYb`Y]bYb`<Ui`W`j`cb`F`UZZ]bYggY`
<]Yf`_Ubb`a`Ub`g]W`Ui`Z`a`Y`f[`Ab[]][Y`A`YbØg`žFYi`Ybž`X]Y`gck`c`\\
]bX]gWY`U`g`Ui`W`_cb]bYbhU`Y`; Yf]W`hY`i`a`ZUggYb`"J Y[YhUf]gWY
Cdh]cbYb`Xca`]b]YfYbž`dUggYbX`ni`f`_i`hi`fY`Yb`Df`ÄZYfYbn`j`]Y`Yf
FY]gYbXYfž`i`bX`fY]W`Yb`j`cb`WfYa`][Ya`8U`A`U`_`Ub]ž`Y]bYa
@]bgYb[Yf]W`h`a`]h`6i`hhYfž`V]g`\\]b`ni`Zi`ZZ[Ya`BUUb!6fch`ϕ
NØ[Yb`k`]Y`XYa`DU`UW`cb`K`\\YY`g`k`]fX`X]Y`J`YfdZY[i`b[`c`Zh`Xi`fW
fY[]cbU`Y`GdYn]U`]h`h`Yb`Yf[`Abnhž`X]Y`Ub`X]Y`F`ci`hY`Ub[YdUggh`g]bX
`Yhk`U`Y]b`k`Øfn][Yg`F`U`Ugh`\\Ub]!7i`ffmž`k`Ä`fYbX`a`Ub`Xi`fW`X]Y
K`ØghY`H`Uf[`Y]hYh`"

ϕ`XYb`Y]bZUWYfYb`?`UggYbž`k`]Y`XYf`G`YYdYf`7`Ugg`cXYf`; YbYfU`
7`Uggž`]gh`XUg`_i`]bUf]gWY`9f`YVb]g`XYi`h`]W`Y`YVYbX][Yf`i`bX`

gdcbhUbYf" < ÅbX`Yf`ghY][Yb`Ub`YXYa`6U\b\cZni ž]\fY`Fi ZY
\U`Yb`Xi fW`X]Y`K U[[cbgž`k Å\fybX`g]Y`U`Yg`j cb`GUa`cgUg`
Zf]hh]YfhYb`HY][hUgW`Yb`a`]h`? UfhcZY`!`cXYf`9fVgYbZØ`i b[`V]g`ni
_bi`gdf][Yb`DU`_cfUg`UbV]YhYbž`X]Y`cZ`h`a`]h`gW`UfZYf`A`]bn!`7\i`hbYm
gYfj`]Yfh`k`YfXYb`"6YgcbXYfg`VY`]YVh`g]bX`J`UXU`DUj`ž`Y]b`k`Øfn][Yf
? UfhcZY`!`6i`f[Yf`Ui`g`A`i`a`VU]ž`XYf`dYfZY`_h`ZØf`i`bhYfk`Y[g`]gh`
8]YgY`GbUW`_g`g]bX`b]W`h`bi`f`[Øbgh][ž`gcbXYfb`Ui`W`Y]b
Ui`h`Yb]gW`Yf`9]bV`]W`_`]b`X]Y`GhfU» Yb`ØW`Yž`X]Y`XUg`@UbX`dfÅ[h`

9]b`i`bj`Yfn]W`hVUfYf`6Y[`Y]hYf`Ui`Z`YXYf`Ni` [ZU`fh]gh`XYf`7\U]ž`XYf
]b`_`Y]bYb`Hcb!`cXYf`D`Ugh]_VYW`Yfb`j`cb` `7\U]k`U`U`g
Ub[YVchYb`k`]fX`"8]YgYf`gØ» Yž`a`]W`][Y`HY`Yž`[Yk`Øfn`h`a`]h
? UfXUa`ca`i`bX`a`UbW`a`U``b[k`Yfž`]gh`a`Y`f`U`g`Y]b`; YhfÅb`_`Yf
]gh`Y]b`GhØW`_`]bX]gW`Yf`?`i`h`i`f`"5b`6U\b\ØZYb`k`]Y`]b`8Y`\`]cXYf
?c`_UhU`_Ubb`a`Ub`Ui`W`fY[]cbU`Y`J`Uf]UbhYb`k`]Y`A`UgU`U`7\U]
dfcV]YfYbž`XYf`a`]h`Y]bYf`_f`ÅZ]h][Yb`A`]gW`i`b[`Ui`g`; Yk`ØfnYb
ni`VYfY]hYh`k`]fX`"9g`c`b`h`g]W`ž`XYb`< ÅbX`Yfb`ni`ni`gY`Ybž`k`]Y`g]Y
XYb`\Y]» Yb`HY`Y`[YgW`]W`_h`nk`]gW`Yb`6Y`Å`h`Yfb`[]Y» Ybž`i`a`]\b
UVni`_Ø`Ybž`VYj`cf`Yf`[YfY]W`h`k`]fX`"

: Øf`Åb[YfY`; U`fhYbž`VYgcbXYfg`]b`9l`dfYggnØ[Yb`k`]Y`XYa
FU`X`U`b]cXYf`G`U`hUVX]ž`k`YfXYb`cZ`h`H`U`]g`Ub[YVchYb`
_ca`d`Y`hhY`A`U`\`nY]hYb`Ui`Z`Y]bYa`HUV`Y`hž`X]Y`Y]bY`5i`gk`U`\`Ub
; Yf]W`hYb`V]YhYb`"9]b`hmd]gW`Yg`j`Y[YhUf]gW`Yg`H`U`]_Øb`hY`F`Y]gž
8U`f@]bgYbgi`ddYž`Y]b`; Ya`ØgYW`ffmž`F`ch]fl`UXYbVfch`i`bX`Y]bY
_Y]bY`Dc`fh]cb`æ[\i`fh`i`a`ZUggYb`"8]YgY`A`U`\`nY]hYb`gd]Y[Y`b`X]Y
fY[]cbU`Y`?ØW`Y`k`]XYf`5i`Z`GhfYW`_Yb`Xi`fW`B`cfX]bX]Yb
Xca`]b]YfYb`; Yf]W`hY`k`]Y`DUbYYf`6i`hYf`A`UgU`Už`k`Å`fYbX`]a
GØXYbž`Yhk`U`Ui`Z`XYf`F`ci`hY`XYg`; c`XYb`7\Uf]chž`F`Y]g`a`]h`GUa`VUfž
Y]bYf`k`Øfn][Yb`@]bgYbgi`ddYž`i`bX`?c`_cg!`7\i`hbYm`\Åi`Z[Yf`g]bX`"
8]Y`E`i`U`]h`Å`h`_Ubb`j`Uf]]YfYbž`XcW`X]Y`9fZU`fi`b[ž`]ba`]hYb`XYg
Ni`[hfi`VY`g`ni`Y`ggYbž`V`Y]Vh`Y]bn][Ufh]["

K`Yf`Ui`Z`Bi`a`a`Yf`g]W`Yf`[Y`Yb`a`ØW`hYž`gc`h`Y`Y][YbY`GbUW`_g
a`]hVf]b[Ybž`XU`b]W`h`]a`a`Yf`[UfUb]h]Yfh`]ghž`XUgg`< ÅbX`Yf`Ub
YXYa`< U`h`ni`ghY][Yb`"HfcW`_YbZfØW`hYž`B`ØggY`cXYf`j`YfdUW`_hY
?Y`_gY`g]bX`dfU`_h]gW`ž`XcW`X`ZØf`Y]bYb`<Ui`W`j`cb`@`_U`_c`cf]h
`c`b`h`Y`g`g]W`ž`Ub`[fØ» YfYb`6U\b\ØZYb`k`]Y`A`i`a`VU]cXYf`7\YbbU]

fY[]cbU`Y`GØ»][[_Y]hYb`ni`_Ui`ZYb`"DfcV]YfYb`G]Y`Yhk`U`DYXUž`Y]bY
a`]W][`Y`GØ»][[_Y]h`Ui`g`B`c`f`X]bX]Ybž`c`XYf`A`mgcfY`DU_ž`Y]b
Vi`hf][`Yg`;`YVÄW`_Ui`g`XYa`_GØXYbž`XUg`Ui`Z`XYf`Ni`b[`Y`nYf[`Y`h`
Gc`W`Y`@YW`_YfY]Yb`g]bX`c`Z]b`_Y]bYb`@ÄXYb`Ua`_6U`b`ghY][
Yf`Ä`h`]W`i`bX`V]YhYb`Y]bYb`gØ»Yb`9]bV`]W`_]b`X]Y`J`J]Y`ZU`h`XYf
]bX]gW`Yb`?ØW`Yž`k`]Y`Ui`W`_Ui`Z`6U`b`fY]gYb`"XY`Yfk`Ä`b`hž`k`c
Ui`h`Y`bh]gW`Y`_i`_]bUf]gW`Y`9f`YVb]ggY`k`]Y`7`U]i`bX`j`Y[`Y`hUf]gW`Y
;`Yf]W`hY`U`g`HY]`XYf`FY]gY`Y`fj`cf[`Y`c`VYb`k`YfXYb"

9]b`d`UUf`9a`dZY`i`b[`Yb`ZØf`i`bhYfk`Y[`g`<`U`hYb`G]Y`5i`ggW`Ui`b`UW`
6]fmU]b]ž`Y]bYa`k`Øfn][`Yb`FY]g[`Yf]W`h`a`]h;`Ya`ØgY`c`XYf`
<Ø`b`W`Ybž`XUg`VYgcb`XYfg`Ui`Z`GhfYW`_Yb`Xi`fW`<`m`XYfUVUX`c`XYf`
?c`_U`h`U`Ub[`YV`chYb`k`]fX`"9g`k`]fX`c`Z]b`_Y]bYb`6Y`Ä`h`Yfb`
j`Yf`_Ui`Z]i`bX`]gh`Y]bY`gÄ`h][`YbXY`A`U`n`Y]h":`Øf`Y]bY`Y]W`hY`C`d]cb`
g]bX`≠`g`_`[`YX`Ä`a`d`Z]Y`FY]g`_i`W`Yb`_Ui`g`GØX]bX]Yb`_`]XYU`ž`c`Z]h`
VY[`Y`]hYh`j`cb`Y]bYa`_g`W`UfZYb`GUa`VUf`"i`bX`k`Ybb`XYf`<`i`b[`Yf`
nk`]gW`Yb`XYb`<`U`hYb`ni`gW`Ä`[`hž`g]bX`Zf]gW`Y`:`fØW`hY`k`]Y`
6UbUbYb`c`XYf`;`i`Uj`Ybž`X]Y`<`Ä`bX`Yf`UbV]YhYbž`Y]bY`[`Ygi`bXY`
K`U`ž`j`cfUi`g[`YgYhnhž`a`Ub`UW`hYh`Ui`Z`<`m[`]YbY"

8`Ug`9ggYb`]a`Ni`[`_]gh`Y]b`Gd]Y[`Y`V]`X`XYf`]bX]gW`Yb`
;`UghZfYi`bXgW`UZh`_c`Z]h`Y]Yb`A`]hfY]gYbXY`_]\fY`gY`Vgh[`YVfUW`hYb`
GdY]gYbž`i`bX`Y]b`;`YgdfÄW`_VY[`]bb`h`ØVYf`Y]bYa`_`[`YhY]`hYb`GhØW`_`
F`ch]"`K`Ä`fYbX`XYf`Ni`[`Xi`fW`X]Y`@UbXgW`UZh`fc`hž`k`]fX`Y`XY`
A`U`n`Y]h`ni`Y]bYa`_`_Y]bYb`?Ud]hY`XYf`FY]gYž`[`Yk`Øfn`h`a`]h`
5fca`Ybž`X]Y`gc`j`]Y`ZÄ`h][`_g]bX`k`]Y`X]Y`FY[`]cbYbž`X]Y`a`Ub`
Xi`fW`ei`Yfh"

G]W`Yf`Y]hgi`bX`;`Ygi`bX`Y]hg`_]bk`Y]gY`



6Y]a`9]bghY][Yb`]b`Y]bYb`]bX]gWXYb`Ni [`VY[]bbh`b]W`h`bi`f`Y]bY
F`Y]gY`Xi`fW`UhYa`VYfUi`VYbXY`@UbXgW`UZhYb`ž`gcbXYfb`Ui`W`Y]bY
J`YfUbhk`cfhi`b[`ž`Ui`Z`g]W`gY`Vgh`i`bX`X]Y`I`a`[`YVi`b[`UW`hni`[`YVYb`"
G]W`Yf\Y]h`i`bX` ;`Ygi`bX\Y]h`ig]bX`Ui`Z`gc`W`Yb` :`U`fhYb`j`cb
nYbhfU`Yf`6YXYi`hi`b[`ž`XYbb`XUg`X]W`hY` ;`YXf`Ab[`Y`Ub`6U`b` \`ÖZYb
i`bX`X]Y`Ub[`Yb`GhfYW`_Yb`Xi`fW`i`bhYfgW`]YX`]W`Y`F`Y`[]cbYb
Vf]b[`Yb`]\fY`Y][`YbYb`<YfUi`gZcfXYfi`b[`Yb`a`]h`ig]W`"A`h`Yhk`Ug
J`cf]g]W`h`i`bX`XYb`f]W`h][`Yb`J`cf`_Y`f`i`b[`Yb`"Äggh`g]W`"YXcW`j`]Y`Yg
j`Yfa`Y]XYb`ž`gcXUgg`XUg`5VYbhYi`Yf`i`b[`Yhf`ØVh`V`Y]Vh`"

9]b`YfghYf`Di`b`_h`VYhf]Zh`X]Y`dYfg`Öb`]W`Y`G]W`Yf\Y]h`ž`VYgcbXYfg`]b
VY`YVhYb`6U`b` \`ÖZYb`k`]Y`8Y`\`ž`A`i`a`VU]`cXYf`?`c`_UhUž`k`c
HUgW`YbX]YVghU`\`_Y]bY`GY`hYb`Y]h`]gh`"K`YfhgUW`Yb`k`]Y` ;`Y`X`ž
F`Y]gYdUgg`i`bX`9`Y`_hfc`b[_]`gc`"hYb`ghYhg`bU`Ua`" ?`ÖfdYf`[`YhfU[`Yb
k`YfXYb`ž`]XYU`Yfk`Y]gY`]b`Y]bYf`j`YfgW`cggYbYb`HUgW`Y`cXYf
Y]bYa` ;`Y`X[`ØfhY`"9g`Ya`dZ]Y`\`h`ig]W`ž` ;`Yd`ÄW`_a`]h`_Y]bYb
GW`"ÖggYfb`ni`g]W`Yfb`ž`j`cf`U`"Ya`"]b`cZYbYb`?"UggYb`k`]Y`XYf
G`YYdYf`7`Ugg`cXYf` ;`YbYfU`7`Uggž`k`c`X]Y`5VhY]`Y`k`Yb][`Yf`df]j`Uh
g]bX`"B`UW`hg`]gh`Yg`fUhgUa`ž`HUgW`Yb`i`bhYf`XYa`" ?`cdZ`]ggYb`cXYf
]b`XYf`B`Ä`Y`ni`j`YfghUi`Yb`ž`i`a`"i`b`]YVgUa`Y` ,`VYffUgW`i`b[`Yb`ni
j`Yfa`Y]XYb`"

8]Y`U`"[`Ya`Y]bY`G]W`Yf\Y]hg`U[`Y`]b`"bX]Yb`_Ubb`Y`bUW`F`Y`[]cb

j Uf]]YfYbži bX`Yg`c\`bhg]Włżj cfUV`]bZcfa]Yfh`ni`gY]b`K`À\`fYbX
hci f]gh]gWłY` ; YV]YhY`k]Y`F`U`Ugh\`Ub`cXYf` ; cU`a`Y]gh`U`g`g]WłYf
[`Y`hYbž[]Vh`Yg`F`Y[]cb`Yb`k]Y`łJa`a`i`i`bX`?`UgWł`a`f`c`XYf`A`Ub]di`fž
Z0f`X]Y`F`Y]gYk`Ufbi`b[`Yb`V`YghY\`Yb`Ui`Z[`fi`bX`dc`h]gWłYf
GdUbbi`b[`Yb`c`XYf`?`cbZ]_`hY`"8`Ug`5i`gk`Àfh][`Y`5a`h`V]YhYh`U`_`hi`Y`Y
<]bk`Y]gY`i`bX`Ya`dZ]Y\`hž]g]Wł`j`b`X]Y`?`f]gYbj`c`fgcf[`Y`]ghY
Y]bni`hfU[`Yb`ži`a`]a`B`chZU``_`cb`hU`_`h]Yfh`ni`k`YfXYb`"5i`Z]\`fYf
K`YVgY]hY`5i`gk`Àfh][`Yg`5a`h`Z]bXYb`g]Wł`XYhU]``]YfhY
łZcfa`Uh]cb`Yb`ni`F]g]_`Yb`i`bX`J`Yf\`U`hY`b`gk`Y]gYbž`Y`h`k`U`X`Ug
J`Yfa`Y]XYb`j`cb`8`Ya`cb`ghf`Uh]cb`Yb`c`XYf`A`Yb`gWł`Yb`Ubg`Ua`a`i`b[`Yb`ž
X]Y`gWł`bY``Yg`U`]YfYb`_`0bb`Yb`"

; Ygi`bX\`Y]h]WłY`J`c`fgcf[`Y`gd]Y`h`YVYb`ZU`g`Y]bY`[`fc»`Y`F`c`Y`ž`XU
`Ub[`Y`Ni`[`ZU\`fhYb`i`bX`k`YWł`gY`b`X`Y`_]a`Uh]gWłY`6`YX]b[`i`b[`Yb`XYb
?`0fd`Yf`V`Y`UghYb`_`0bb`Yb`"9]bY`F`Y]gY`_`f`Ub`_`Y`bj`Y`fg]WłYfi`b[`]gh
i`bYf`À`gg]Wł`ž`X`U`X]Y`a`Y`X]n]b]gWłY`J`Y`fgcf[`i`b[`ž`V`Y`gcb`XYfg`]b
`À`b`X`]Wł`Yb` ; YV]YhYb`Yb`h`Ub[`]a`Ub`Wł`Yf`G`hf`Y`W`_`Yb`ži`bni`fY]Wł`Yb`X
gY]b`_`Ubb`" ?`f`Ub`_`Y]hYb`k]Y`A`U`Uf]U`c`XYf`8`Yb[`i`Y`g]b`X`]b
V`Y`gh]a`a`hYb`F`Y[]cb`Yb`žj`cf`U`Ya`k`À\`fYbX`XYf`A`cbgi`bnY]hj`cb
ł`]V]g`G`Y`d`h`Ya`V`Y`f`ž`Y]b`F]g]_`c`"A`0`W`_`Y`bgWł`i`hna`]hY`i`b`X
`Ub[`À`fa`Y`][`Y`?`Y]Xi`b[`]V]YhYb`Y]bY`Y`f`ghY`6`Uff]YfY`ž`k`À\`fYbX`Y]bY
`Y]bY`F`Y]gY`Udch\`Y``Y`a`]h`A`Y`X]_`Ua`Yb`hYb`[`Y[`Yb`8i`f`Wł`ZU`ž`:]YVYf
c`XYf`G`Wł`a`Yfn`Yb`Z0f`B`chZ`A`Y`\`]Z`fY]Wł`]gh`"

<`m[]YbY`Ub`6`cfX`i`bX`Ub`6`U\`b\`0ZYb`YfZcfXYfh`V`Y`gcb`XYfY
5i`Za`Yf`_`g`Ua`_`Y]h`"@Y]hi`b[`gk`UggYf`gc``hY`b]Ya`U`g[`Yhfi`b`_`Yb
k`YfXYb`i`gh`U`h`X`Y`ggYb`g]b`X`UV[`Y`Z0`hY`K`UggYfZ`UgWł`Yb`X]Y`g]Wł`YfY
K`U\`ž`X]Y`Ub`XYb`a`Y]ghYb`<`U`hY`ghY``Yb`Yf\`À`h]Wł`g]b`X`"9`ggYb`j`cb
<`À`b`X`Y`fb`_`Ubb`j`Yf`c`W`_`Yb`X`gY]b`ž`X`c`Wł`J`c`fg]Wł`h`]gh[`YV`chYb.`Bi`f
Zf]gWł`ni`V`Y`fY]hY`hY`ž`\`Y]»`Y`GdY]gYb`c`XYf`j`Yfd`U`W`_`hY`G`b`U`W`_`g
a`]b]a`]YfYb`X`Ug`F]g]_`c`j`cb`A`U[`Yb`d`f`c`V`Ya`Yb`"C`V`gh`gc``hY
[`YgWł`À`h`k`YfXYb`ži`bX`Yg`Ya`dZ]Y\`h`g]Wł`ž`8`Yg]b`ZY`_`h]cb`gh`0`Wł`Yf
c`XYf`<`Ub`X[`Y`X`U`V`Y]ni`h\`U`V`Yb`ž`X`U`K`UgWł`a`0[`]Wł`_`Y]hYb`]b`N0[`Yb
c`Zi`V`Y[`fY`b`nh`g]b`X`"Hc`]Y`hYb`Ub`6`cfX`ž`V`Y`gcb`XYfg`]b`b]Y`X`f][`YfYb
?`UggYb`ž`g]b`X`b]Wł`h]a`a`Yf`g`Ui`V`Y`f`ž`X`U`Y`f`g]b`X`9]bk`Y[`h0`Wł`Yf`c`XYf
Y][`Yb`Y`g`Hc`]Y`hY`b`d`Ud]Yf`Y]bY`g]b`bj`c``Y`9f[`À`bni`b[`]a`i` ;`Yd`À`W`_`"

8]Y`d`\`mg]gWłY`6`Y`Ughi`b[``Ub[`Yf` :`U\`fhYb`gc``hY`b]Wł`h`i`b`hY`fgWł`À`hnh

k YfXYbžVYgcbXYfg]b`b]W\h[_]a Uh]g]YfhYb`?`UggYbž`k c`<]hny`i bX
9b[Y`UbghfYb[YbX`gY]b`_`ObbYb`"5i gfY]W\YbX`K UggYf
a]hni ZØ\fYb`i bX`fY[Y`a`À»][`ni`hf]b_Ybž`\]`Zn[Y[Yb
8Y\mXf]Yfi b[ž`k`À`fYbX`Y]W\hY`?`Y]Xi b[`Ui`g`Uha`i b[gU_hj] Yb
GhcZYb`XYb`?ca Zcfh`Yf\`Ö`h`"6Y]`B`UW`hZU`fhYb`]gh`Yg`fUhgUa`ž`Y]bY
`Y]W\hY`8YW_Y`cXYf`Y]bYb`GW`U`ZgUW`_`a]hni Vf]b[Ybž`XU`X]Y
VYfY]h[YghY`hY`6Yh`k`À`gW`Y`b]W\h]a`a`Yf`gUi`VYf`]gh`"K`Yf
Ya`dZ]bX`]W`Ui`Z`@`À`fa`fYU[]Yfhž`gc`hY`C`fgh`Ò`dgY`cXYf`?`cdZ`Ø`fYf
Y]bdUW_Ybž`i`a`g]W\`j`cb`;`Ygdf`À`W`Yb`cXYf`6U`b`cZg`À`fa
UVni`gW`]fa`Yb`"

5i W`B`Uhi`f[Yk`U`hYb`_`ObbYb`Y]bY`F`c`Y`gd]Y`Ybž`XU``X]Yb`UbZ`À`][
ZØf`9fXVYVYb`]b`b`Ø`fX`]W\Yb`F`Y[]cbYb`cXYf`,`VYfgW\k`Ya`a`i`b[Yb
k`À`fYbX`XYg`A`cbgi`bg`]gh`"9g`c`\bh]g]W\ž`j`cf`XYf`F`Y]gY
K`YhhYfVYf]W\hY`ni`j`YfZc`[Yb`i`bX`VY]`i`bk`YhhYfk`Ufbi`b[Yb`ZYI`]VY`
Ui`Z`U`hYfb`Uhj]`Y`F`ci`hYb`cXYf`J`Yfn`Ø[Yfi`b[Yb`ni`fYU[]YfYb`"`
gc`W`Yb`:``À`Yb`]gh`Yg`\]`ZfY]W\ž`X]Y`5bk`Y]gi`b[Yb`XYg
Ni`[`dYfgcb`U`g`cXYf`XYf`G]W\Yf\Y]hg`_`f`À`ZhY`ni`VYZc`[Ybž`X]Y`c`Zh
ØVYf`U`_`hi`Y`Y`9bhk`]W`_`i`b[Yb`]bZc`fa`]Yfh]g]bX`"

: Øf`U`Y]b`fY]gYbXY`:`fUi`Yb`[Y`hYb`ni`g`À`hn`]W\Y
J`c`fg]W\hga`U`»`bU`a`Ybž`i`a`i`bUb[YbY`a`Y`G]hi`Uh]cbYb`ni
j`Yfa`Y]XYb`"8]Y`K`U`_`j`cb`_`_]a`Uh]g]YfhYb`?`UggYb`cXYf`gdYn]Y`Yb
:`fUi`YbUVhY`]Ybž`X]Y`]b`j`]Y`Yb`NØ[Yb`j`YfZØ[VUf`g]bXž`V]YhYh`a`Y`f
G]W\Yf\Y]h`i`bX`Df]j`Uhgd`\`À`fY`"5b[Ya`YggYbY`?`Y]Xi`b[ž`X]Y
GW`i`hYfb`i`bX`?`b]Y`VYXYW`hž`\]`Zh`i`bYfk`ØbgW\hY`5i`Za`Yf`_`gUa`_`Y]h
ni`a`]b]a`]YfYb`"9g`]gh]g]bbj`c`ž`VY]`B`UW`hZU`fhYb`]b`XYf`B`À`Y`j`cb
:`Ua`]Y]Yb`cXYf`UbXYfYb`:`fUi`Yb`ni`V`Y]VYb`i`bX`?`cbhU`hY`ni
j`Yfa`Y]XYbž`X]Y`i`bUb[YbY`a`k`]f`_`Yb`"

A]h`X]YgYb`A`U`»`bU`a`Yb`]a`<]bhYf`_`cdZ`À`ggh]g]W\`X]Y`F`Y]gY
gc`f[YbZfY]`[YghU`hYbž`gcXUgg`XYf`:`c`_`i`g`Ui`Z`XYb`9f`YVb]ggYb
V`Y]Vhž`X]Y``X]Ybg`NØ[Y`gc`VYgcbXYfg`a`UW\Yb`"K`À`fYbX`X]Y
@UbXgW\UZh`X`fUi`»`Yb`j`cfVY]n]Y`hž`k`]fX`_`Ufž`XUgg`Y]b`k`Yb][
5W`hgUa`_`Y]h`XYb`K`Y[`ZØf`i`bj`Yf[Ygg]W\Y`A`ca`YbhY`YVbYhž`X]Y
bcW`_`Ub[Y`bUW`X`Yf`5b`_`i`bZh`bUW`_]b[Yb`"

? i `hi fY`Y`6Y[Y[bi b[Yb



5`g`XYf`Ni [`a]h`Y]bYa `gUbZhYb`Fi W`UbZÀ\fhž`ÒZbYh`g]W`b]W`h`bi`f`
X]Y`@UbXgW`UZhj`cf`XYa` : YbghYfž`gcbXYfb`Ui W`Y]b`F`Ui`a`ZØf`
6Y[Y[bi b[Ybž`X]Y`c`Zhi`bYfk`UfhYh`XUg`<`Yfn`VYfØ`fYb`" `đ`XYb`
K`U[[cbg`XYf`đX]Ub`F`U]`k`Umgž`k`c`XYf`8`i`Zhj`cb`7`U]`i`bX`XUg`
A`i`fa`Y`b`j`]Y`Yf`GdfUW`Yb`X]Y`@`ZhYfZØ`Ybž`k`YfXYb` : fYa`XY`ni`
ZØW`h][`Yb` : fYi`bXYb`" `>`XY` : U`fh`V]f[`h`X]Y`A`Ò[`]W`_Y]hž`
; YgW`]W`hYb`ni` `ÖfYb`i`bX`ni` `hY]`Ybž`X]Y`gc`Vi`bh`g]bX`k`]Y`X]Y`
A`Āf`_hY`j`cb`8Y`\\`]cXYf`X]Y`K`ØghYb`F`U`Ugh`Ubg` `A`ca`YbhYž`X]Y`
Y]bY`F`Y]gY`i`bj`Yf[`Ygg`]W`a`UW`Yb`"

5i`ZY]bYf`BUW`hZU`fhj`cb`8Y`\\`]bUW` `J`UfUbUg]ž`]b`XYf`ei`]f`][`Yb`
G`YYdYf`7`Uggž`ZUbX`]W`a`]W`b`YVYb`Y]bYf` : Ua`]]Y`k`]YXYfž`X]Y`Ui`Z`
XYa`K`Y[`ni`Y]bYa` `HYa`dY`ZYgh`k`Uf`"8]Y`A`i`hYfž`]b`Y]bYa`
`Yi`W`hYbX`[`Y`VYb`GUF]ž`Vch`a`]f`a`]h`Y]bYa` `k`Ufa`Yb`@`W`Y`b`Y]b`
GhØW`_`Ui`g[`Ya`UW`hYg`DUfUh`U`Ubž`k`Ā`fYbX`]`f`_`Y]bYf`Gc`b`
bYi` []Yf][`Ui`Za`Y]b`Bch]nVi`W`gW`]Y`hY`"A`]h`[`YVfc`W`YbYa`
9b[`]gW`i`bX`j`]Y`Yb` ; YghYb`Yfn`Ā`hY`g]Y`j`cb`]`fYf`<`Y]a`UghgUXhž`
XYb`F`]hi`U`Yb`Ua` : Ub[`Yg`i`bX`XYf`6YXYi`hi`b[`XYg` : YghYg`"9g`k`Uf`
_Y]b`h]YZ[`fØbX][`Yg` ; YgdfĀW`ž`XcW`X]Y`<`Yfn`]W`_Y]hž`a`]h`XYf`g]Y`
a`]W`]b`]`fYb`?`fY]g`Ui`ZbU`a`ž`]Y`»`X]Y`Ghi`bXYb`k`]Y`A`]bi`hYb`
j`Yf[`Y`Yb`"Gc`W`Y`gdc`bh`Ub`Yb` ; YghYb`XYf` ; UghZfYi`bXgW`UZh]g]bX`

_Y]bY`GY`hYb\Y]hž`gcbXYfb`Y]b`Gd]Y[Y`V]`X`XYf`]bX]gWXYb`?i`hi`fž`
X]Y`XUg`HY]`Yb`U`g`gY`Vghj`Yfgh`bX`]W`Ubg]Y`h`

5b`Y]bYa`UbXYfYb`HU[ž`Ui`Z`XYf`GhfYW_Y`j`cb`A`i`a`VU]`bUW` ;`cUž`
hY]`hY`]W`Y]b`5VhY]`a`]h`Y]bYa``↑`b[`Yb`Ghi`XYbhYbž`XYf`]b`Y]bYa`
_]`a`Uh]g]YfhYb`K`U[[`cb`Ui`Z`XYa`K`Y[`ni`Y]bYa`DfU_h]_i`a`k`Uf``9f`
gdfi`XY`hY`ØVYf`j`cf`6Y[`Y]ghYfi`b[ž`U`g`Yf`j`cb`gY]bYb`Hf`Ai`a`Yb`
Yfn`hY`ž`]b`XYf`≠!6fU`bW`Y` :`i`»`ni`ZUggYbž`i`bX`ZfU[`hY`a`]W`
bYi` []Yf][`bUW`a`Y]bYa``<Y]a`Uh`UbX``6U`X`[`YgY`hY`g]W`Y]b`
`hY`fYf`<Yff`\]bni`ž`XYf`a`]h`Y]bYa`VfY]hYb` ;`f]bgYb`j`cb`gY]bYb`
FY]gYb`]b`XYb`+\$Yfb`VYf]W`hYhYž`U`g`NØ[`Y`bcW`a`]h`
8Ua`dZc`_ca`ch]j`Yb`Z`\fYb``K`]f`UW`hYb`ØVYf`gY]bY`5bY`_XchYb`
j`cb`J`Yfgd`hY`b[`Yb`ž`X]Y`XUa`U`g`Y`Yf`FY[`Y`U`g`5i`gbU`a`Y`k`UfYbž`
i`bX`hUi`gW`hYb`H]ddg`ZØf`Ghf`bX`Y]b` ;`cU`Ui`g``8]YgY`6Y[`Y[`bi`b[`
nY][`hY`ž`k`]Y[`YbYfUh]cbYbØVYf[`fY]Z]bX`i`bX`c`ZYb`XYf`5i`ghUi`gW`]b`
]bX]gWXYb`NØ[`Yb`gY]b`_Ubb`Y]b`C`fhž`Ub`XYa`NY]hi`bX`
<]bhYf[`fi`bX`j`YfgW`k`]a`a`Yb`"

5i`ZY]bYf`_ØfnYfYb` :`U`fhj`cb`d]di`f`bUW`5[`fUž`]ba`]hYb`XYg`
 ;`c`XYbYb`8fY]YW_gž`hfUZ`]W`Ui`Z`Y]bY` ;`fi`ddY`Yi`fcd`A]gW`Yf`
6UW_dUW_Yfž`X]Y`YVYbgc`ZUgn]b]Yfhk`]Y`ØVYfZcfXYfhj`ca`Hfi`VY`
XYg`6U`b`c`Zg`k`]f`hYb``K`]f`_Ua`Yb`]bg` ;`Ygd`f`W`ž`U`g`Y]bYf`j`cb`
]`bYb`a`]W`ZfU[`hY`ž`k`]Y`a`Ub`Y]bYb`7\U]`VY]`XYb`<`bX`Yfb`VYghY``h`
6U`X`gU`»`Yb`k`]f`ni`gUa`a`Yb`ž`hY]`hYb`GUa`cgUg`i`bX`Yfn`hY`b`i`bg`
j`cb`i`bgYfYb`9f`YVb]ggYb`g`]Y`j`cb`]`fYf`K`UbXYfi`b[`]b`XYb`
<]a`U`UmUgž`]W`j`cb`XYb`ZUfVYbZfc`Yb`A`Af`hYb`F`U`Ugh`Ubg``9g`
k`Uf`Y]b`ZØW`h][`Yf`A`ca`Ybh`XYf`?`Ua`YfUXgW`Už`XYf`nY][`hY`ž`k`]Y`
NØ[`Y`b]W`h`bi`f`9]b`Y]a`]gW`Y`ž`gcbXYfb`Ui`W`FY]gYbXY`Ui`g`U`Yf`
K`Y`h`j`Yfv]bXYb``Gc`W`Y`6Y[`Y[`bi`b[`Yb`g]bX`c`Zi`XYf`GW`ØggY`ni`
bYi`Yb`DYfgdY_h]j`Yb`ž`k`]Y`Ui`W`Ui`Z`6U`b`fY]gYb`"XY`VYhcb`h`k`]fXž`
k`c`Ui`h`Yb`h]gW`Y`_i`hi`fY``Y`9f`YVb]ggY`U`g`<YfnghØW`Y]bYf`
Ni` [fY]gY`Yfj`cf[`Y`c`VYb`k`YfXYb`"

9]bY`VYgcbXYfg`Y]bXfi`W_gj`c``Y`6Y[`Y[`bi`b[`YfY][`bYhY`g]W`Ui`Z`XYf`
F`ci`hY`j`cb`?`c`_UhU`bUW`8Uf`YY`]b[ž`U`g`]W`]b`Y]bYa`ØVYfZØ`hYb`
K`U[[`cb`bYVYb`Y]bYa``hY`fYb`A`Ubb`UbXYhYž`XYf`g]W`U`g`
dYbg]cb]YfhYf`@Y`fYf`j`cfghY`hY``A`]h`Y]bYa` :`i`b`_Y`b`]b`XYb`5i` [`Yb`
VY[`Ubb`Yfž` ;`YX]W`hY`j`cb`F`UV]bXfU`bU`h`HU[`cfY`ni`fYn]h]YfYbž`

k Å\fybX`X]Y`<Ø[Y`XYg`<]a U`UmUg`XfUi » Yb`j cfVY]nc[Yb``GY]bY
Gh]a a Yž`gUbZhi`bX`XcW`_fUZhj`c``ž`nc[`X]Y`5i Za Yf_gUa _Y]h
UbXYfYf`A]hfY]gYbXYf`Ui Z`g]W`ž`i bX`VU`X`Ui gW`hY`XUg`[YgUa hY
5VhY]`[YVUbbh``9f`Yf_`ÅfhY`a]f`X]Y`6YXYi hi b[`XYf`J YfgY`i bX
gdfUW`ØVYf`X]Y`GW`Øb`Y]h`gY]bYf`<Y]a UhfY[]cb``8]YgY
6Y[Y[bi b[`k Uf`k]Y`Y]b` : YbghYf`]b`X]Y`GY`Y`6Yb[U`Ybgž`Y]b
A ca Ybhž`XYf`X]Y`A U[]Y`XYg`Ni ZU`g`]b`Y]bYa `Ni [UVhY]`Y]bZ]b["

B]W`h`U`Y`6Y[Y[bi b[Yb`g]bX`j cb`K cfhYb`[YdfÅ[h`i`a UbW`a U`
fY]W`h`Y]b`6`]W`_cXYf`Y]bY` ; YghY``5i ZY]bYf` : U\fh`Xi fW`GØX]bX]Ybž
j cb`6Ub[U`cfY`bUW`A mgcfYž`VYa Yf_hY`]W`Y]bY`Å`hYfY` : fUi ž`X]Y
a]h`]\fyb`9b`_Y`b`fY]ghY``G]Y`gdfUW`_Y]b`9b[`]gW`ž`i bX`]W`_Y]b
? UbbUXUž`XcW`U`g`g]Y`a]f`Y]bY`<UbXj`c``[YfØghYhYf`9fXbØggY
UbVchž`j YfghUbXYb`k]f`i bg`c`bY`K cfhY``8]Y`?]bXYf`_]W`YfhYbž`U`g
]W`j Yfgi W`hYž`]\fy`BUa Yb`Ui gni gdfYW`Ybž`i bX`X]Y` ; fc» a i hYf
b]W`_hY`a]f`ZFYi bX`]W`ni ``9g`k Uf`Y]bY`gh]`Y`J YfV]bXi b[ž`X]Y
nY][hYž`k]Y`i b]j YfgY``Y]b`@ÅW`Y`b`gY]b`_Ubbž`gY`Vgh]b`Y]bYa
ØVYfZØ`hYb`K U[[cb"

8]YgY`ZØW`h][Yb`A ca YbhY`XYf`A YbgW``]W`_Y]h`g]bX`Ygž`X]Y`Y]bY
Ni [fY]gY`]b`ϕX]Yb`j cb`UbXYfYb`FY]gYZcfa Yb`UV`YVYb``CV`Yg`X]Y
9]b`UXi b[`]gž`Y]b`GhØW`_gY`Vgh[Y`_cW`hYg`9ggYb`ni`dfcV]YfYbž
cXYf`XUg`@UW`Yb`ØVYf`Y]bY`[YhY]`hY`5bY`_XchY` `X]Y`K U[[cbg
k YfXYb`ni`Y]bYa `GW`a Y`nh]Y[Y`XYf` ; YgW`]W`hYb``K Å\fybX`X]Y
 ; `Y]gY`i bhYf`Y]bYa `XU\]bfUi gW`Ybž`k]fX`YXYf`<U`h`ni`Y]bYf
bYi Yb` ; Y`Y[Yb`Y]hž`Ya UbXYb`_YbbYbni`YfbYbž`XYggYb`K cfhY
cXYf` ; YghYb`bcW`_Ub[Y`bUW`XYf`FY]gY`]a ` ; YXÅW`hb]g`V`Y]VYb"

B UW` \ U`h][_Y]h`i bX`I a k Y`hVYk i gghgY]b



A]h'YXYa ' ?]ca YhYfžXYb'XYf'Ni ['ØVYf'X]Y'GW]YbYb'fc`hž
 \]bhYf'Äggh'Yf'b]W h'bi f'Gdi fYb']b'XYf'@UbXgW UZh'gcbXYfb'Ui W
 Y]bYb'5VXfi W_]b'XYf'l a k Y'h' 'Y]b'H\Ya Už'XUg]b'Y]bYf'K Y'h
 ni bY\ a YbXYf'?']a UVYk i ggh\Y]h']a a Yf'a Y\ f'Ub'6YXYi hi b [
 [Yk]bbh'F Y]gYb'a]h'XYf'6U\ b'Xi fW ' ðX]Yb'V]YhYh'b]W h'bi f
 _i `hi fY`Y`i bX`UbXgW UZh']W Y`F Y]W hØa Yfž'gcbXYfb'Ui W`Y]bY
 A Ø [`]W _Y]hž'X]Y`Y] [YbY`F Y]gY`Ø_c`c []gW`j YfUbhk cfhi b [gj c`ni
 [YghU`hYb`" ða`J Yf [`Y]W`ni `UbXYfYb`J Yf`_Y\fga`]hhY`b`nY] [hg]W
 \]Yf`Y]b`_`UfYf`J cfhY]ž`XYf`gck c` `F Y]gYbXY`U`g`Ui W`X]Y`B Uhi f
 ni [i hY`_ca`a`h`

9]b`k YgYbh]W Yf`D`i`gdi`b`h`XYg`Ni [fY]gYbg`]Y [h`]b`gY]bYa
 j Yf [`Y]W`gk`Y]gY` [Yf]b [Yb`7C`!5i`gghc`»`" ða` ; Y [YbgUhn`ni
 ð`UbXgZØ [Ybž`X]Y`]b` ðX]Yb`Ui`Z [fi bX`XYf` [fc`»`Yb`8]ghUbnYb`c`Zh
 [Ybi`hnh`k`YfXYbž`j`YfVfUi`W`Yb`NØ [Y`dfc`DUggU []Yf`_]`ca`YhYf
 XYi`h]W`k`Yb] [Yf`9bYf []Y`6YgcbXYfg`X]Y` ðX]Ub`F`U]k`Umgž`XYfYb
 BYhn`ni`Y]bYa` [fc`»`Yb`HY]`Y`Y`_hf]Z]n]Yfh]gh` `V]g`_]bi`Uf`&\$&(
 k`UfYb`Yg`Yhk`U`-` (`i` `XYf`GhfYW`_Yb` `gYhnYb`ni`bY\`a`YbX`Ui`Z
 bUW\`U`h] [Y`9bYf []Yei`Y`Yb`"K`À`fYbX`Y]b` :`i` [`j`cb`8Y`\]`bUW
 A`i`a`VU]`HcbbYb`j`cb`HfY]V\`Ui`g [UgYb`ZfY]gYhnhž`fYXi`n]Yfh`Y]bY
 Ni [ZU\`fh`Ui`Z`XYfgY`VYb`GhfYW`_Y`XYb`Ø_c`c []gW`Yb` :`i` »`UVXfi`W_
 Yf\`YV`]W`ž`gY`Vgh`k`Ybb`a`Ub`]b`Y]bYa` _`]a`Uh]g]YfhYb`K`U [[cb
 fY]gh`8]YgY`9Z]n]Ybn`a`UW`h`X]Y`6U\`b`ni`Y]bYf`

i a k Y`hZFYi bX`jWXYb`K U\`ZØF`Fci hYb`k jY`XUg; c`XYbY`8fYjYW_ cXYf`XjY`?ØghYbghfYW_Y`bUWk` ; cU"

J Yf[`]WXYb`a` jh`XYa` `5i hcj Yf_Y`f`gWk`bYjXYh`XjY`6U\`b`YVYbZU`g VYggYf`UV" `ϕXjYbg`GhfU» Yb`g]bX`cZiØVYf`UghYhzi bX`XYf`Ni`ghUbX j jY`Yf`<][\k Umg``Àggh``Àb[YfY` : U\fhYb`ni`f` ; YXi`XgdfcVY`k YfXYb` 9]b`5i hc`cXYf`6i`g`j YfVfUi`Wk`h`b]Wk`h`bi`f`a` Y`f`HfYjVghcZ`dfc DYfgcbž`gcbXYfb`hfÀ[h`Ui`Wk`ni`f`@`Zj YfgWk`a`i`hni`b[`]b`GhÀXhYb k jY`8Y`\"`VY]ž`k`c`Ga`c[`Y]b`Yfbgh\UZhYg`DfcV`Ya` `XUfghY``h" `NØ[Y \]b[Y[Yb`hfUbgdcfh]YfYb`<i`bXYfhY`j`cb`DUggU[jYfYb`[`Y]Wk`nY]h][ž k Ug`XjY`9a`]gg]cbYb`dfc`?cdZ`XfUgh]gWk`gYb`_h" `5i`Z`GhfYW_Yb`k`jY XYf`j`cb`6Ub[U`cfY`bUWk`A`mgcfYž`XjY`a` jh`XYa` ` ; c`XYb`7\Uf]ch VYXjYb`h`k`jfxž`j`Yfa`Y]XYh`a`Ub`gc`b]Wk`h`bi`f`GhUi`gž`gcbXYfb`gWk`cbh Ui`Wk`XjY`l`a`k`Y`h` `Y]b`5gdY`_hž`XYf`Ui`Z`D`UhhZcfa`Yb`k`jY`@`c`h`i`g` HfUj`Y` `]bX]fY`_h`Xi`fWk`XjY`6Yhc`bi`b[`bUWk`U`h][Yf`F`Y]gYfci`hYb k jY`XYf`Xi`fWk`GØX]bX]Yb`Y`fj`cf[Y`c`VYb`k`jfx"

9]b`k`Y]hYfYf`Ö`c`c[]gWk`Yf`j`cfhY]` `]Y[h`]b`XYf`ϕ`ZfUghfi`_hi`f`gY`Vgh" 8 Ug`GWk`jYbYbbYhn`ϕ`XjYbgž`Y]bYg`XYf`[fÖ» hYb`XYf`K`Y`hž`Yl`]gh]Yfh gY]hØVYf`Y]bYa` `ϕ\`f`i`bXYfhi`bX`YfZc`fXYfh]a` `jYf[`Y]Wk`ni`a` `6Ui bYi`Yf` : `i [\ÀZyb`cXYf`5i`hcVU`bYb`k`Yb][Yf`9]b[f]ZY`]b`XjY`B`Uhi`f" K`À`fYbX` : `i [\UZybYfk`Y]hYfi`b[Yb`cZi`ni` `@UbXj`Yf`i`ghi`bX 5V`c`ni`b[`ZØ`fYbž`bi`hnYb`NØ[Y`VYghY`YbXY`?`cff]XcfYž`XjY VYfY]hg`]b`XjY`@`UbXgWk`UZh`]bhY[f]Yfh`g]bX" `8`jYg`]gh`VYgc`bXYfg fY`Yj`Ubh`]b`gYbg]V`Yb`F`Y[]cbYb`k`jY`XYb`<Ø[Y`b`j`cb`8`Uf`YY`]b[ž k`c`XYf`VYfØ`a`hY`Hcm`HfU]b`Xi`fWk`l`B`9G7C`! [YgWk`Ø`hnhY` ; YV]YhY ZÀ`fhž`c`bY`XjY`l`a` [YVi`b[`a`Ugg]j`ni` `VYY]bhfÀWk`h][Yb"

5`YfX]b[g` []Vh`Yg`Ui`Wk`<`YfUi`gZc`fXYfi`b[Ybž`XjY`XYb Ö`c`c[]gWk`Yb`j`cfhY]`XYf`NØ[Y`]b`ϕ`XjYb`hY]`k`Y]gY`fY`Uh]j`jYfYb" j]Y`Y`À`hYfY`K`U[[cbg`i`bX`@`c`_`ca`chj`Yb`g]bX`k`Yb][Yf YbYf[]YYZ]n]Yb`hzi`bX`]b`b]Wk`h`Y`Y`_hf]Z]n]YfhYb`5VgWk`b]hYb _ca`a`Yb`bcWk`8]YgY`nØ[Y`ni`a` `9]bgUhnž`XjY` \Ö`YfY`9a`]gg]cbYb j`Yfi`fgUWk`Yb" `Ni`XYa` `ZØ`fh`XjY]a`a`YbgY`B`UWk`ZfU[Y` `hÀ[`]Wk` bi`hnYb`A`j`]cbYb`A`YbgWk`Yb`XjY`ϕ`XjUb`F`U]`k`Umg` `ni`ØVYfZØ`hYb NØ[Ybž`k`Ug`XYb`9bYf[]Yj`YfVfUi`Wk`dfc` : U\fh`Yf` \Ö`Yb`_Ubb" 8Yb`bcWk`UfVY]hYb`XjY`6Y` \Ö`fXYb`Ub`A`cXYfb]g]Yfi`b[Ybž`k`jY`XYf` 9]bZØ`fi`b[j`cb`<c`Wk`[YgWk`k`]bX][_Y]hgnØ[Yb`i`bX`XYf`k`Y]hYfYb

9`Y_hf]Z]n]Yfi b[ži a `X]Y`l a k Y`hVY`Ughi b[`ni `a]b]a]YfYb"

9]b`cZi`ØVYfgY\YbYf`5gdY`_h]gh`XYf`9]bZi gg`Ui Z`c`_U`Y
; Ya Y]bgW\UZhYb`i bX`FYggci fW`b"Ni [fY]gYb`ZØfXYfb`Y]bY
bUW\U`h][YfY` : cfa `XYg`Hci f]ga i gž`XU`g]Y`FY]gYbXY`X]fY`_h]b
_`Y]bYfY`Gh`XhY`i bX`8`ØfZYf`Vf]b[Ybž`c`bY`XUgg`X]YgY`Xi fW`X`Yb
6Ui `[fc»Yf` : `i [\`AZYb`cXYf`GhfU»YbbYmY`j Yf`AbXYfh`k YfXYb
a `ØggYb"5i Z`F`ci hYb`k]Y`XYf`Xi fW`F`U`Ugh`Ub`a]h`XYa `DU`UW`c`b
K \YY`g`i bhYfgh`Ø`mh`a Ub`c`_U`Y`<`Ab`X`Yf`Ub`6`U`b`\`ØZYbž`c`bY`X]Y
l a k Y`h`Xi fW`ni g`À`h`n`]W`Yb`J`Yf`_`Y`f`ni `VY`UghYb"æ ; Y[YbgUhn
XUni `ZØ`fYb` : `i [fY]gYb`cZi`ni `Y]bYf`?`cbnYbhfUh]cb`j`cb`Hci f]ghYb
]b`k`Yb][Yb`A`Yhf`c`d`c`Ybž`k`Ug`X`c`f`h`ni ` , VYf`Ughi b[`i`bX`\`Ø`YfYa
F`Yggci fW`bj`YfVfUi`W`ZØ`f`h"

F`Y]gYbXY`gY`Vgh`_`Ø`bbYb`XYb`Ø`c`c`[]gW`Yb`J`c`f`hY`]`XYf`6`U`b
j`Yfgh`À`f`_`Ybž`]bXYa `g]Y`VYk`i`ggh`\`UbXY`b"8]Y`K`U`\`j`cb
B`UW`h`n`Ø[Ybž`X]Y``Ab[YfY`GhfY`W`_`Yb`c`b`Y`ni`g`À`h`n`]W`Y`HU[YgZU`f`hYb
UVXYW`_`Ybž`fYXi`n]Yfh`XYb`6`YXUfZ`Ub`k`Y]hYfYb`Hf`Ub`g`d`c`f`h`a]hY`b`"
9VYbgc`\`]Zh`Ygž`D`Ugh]_`a`Ø`ni`j`Yfa`Y]XYbž`]bXYa`a`Ub
k]YXYfj`Yfk`YbXVUfY`K`UggYfZ`UgW`Yb`bi`hnh`i`bX`Ui`Z
9]bk`Y[j`YfdUW`_`i`b[Yb`j`Yfn]W`hYh`i`Y]b`_`Y]bYfž`UVYf
k]f`_`i`b[gj`c`Y`f`6`Y]hfU[]b`Y]bYa`@`UbXž`XUg`a`]h`5`V`ZU`d`f`c`V`Ya`Yb
_`À`a`d`Zh" `Gc`W`X`Y`9`bhgW`Y]Xi`b[Yb`a`UW`Yb`X]Y`F`Y]gY`b]W`h`bi`f
[fØ`bYfž`g`cbXYfb`ZØ`fXYfb`Ui`W`Y]b`h]YZYfYg`6`Yk`i`gghgY]b`ZØ`f`X]Y
l a [YVi`b[ž`X]Y`a`Ub`Xi`fW`ei`Yf`h"

K`À`fYbX`XYf`Ni [`Xi`fW`X]Y`k`Y]hYb`9VYbYb`B`c`f`X]bX]Ybg`c`XYf`X]Y
Ø`d`d][Yb`H`À`Yf`XYg`G`Ø`XYbg`[`Y]hYhž`k]fX`gd`Ø`f`V`Ufž`XUgg`X]YgY`5`fh
XYg`F`Y]gYbg`a`Y`f`U`g`bi`f` : c`f`h`V`Y`k`Y[i`b[`V`Y`X`Y`i`h`Y`h`9`g]gh`Y]bY
7`U`b`W`ž`X]Y`G`W`Ø`b`\`Y]h`XYg`@`Ub`XYg`a`]h`Y]bYa`[Yf]b[YfYb
Ø`c`c`[]gW`Yb`D`fY]g`ni`Yf`Y`V`Y`bž`Y]b` ; `Y]W`[Yk]W`h`nk]gW`Yb
5VYbhYi`Yf`i`bX`J`Yf`Ub`hk`c`f`h`i`b[`ni`Z]bXYbž`XUg`Y`XY` : U`f`h`b`c`W`
k`Yf`h`j`c`Y`f`a`UW`h"

H]d`d`g`ZØ`f`X`Ug`F`Y]gYb`a`]h`?`]bXYfb



8]Y`FY]gY`Xi fW`bX]Yb`a]h`XYa`Ni [`Ubb`Z0f` : Ua `]`Yb`a]h
?]bXYfb`ni `Y]bYa`i bj Yf[Ygg`]WYb`5VYbhYi Yf`k YfXYbž`VY]`XYa
X]Y`?`Y]bYb`[YbUi gc`k]Y`X]Y` ; fc» Yb`]b`XYb`6Ubb`XYf`j]Y`Z`h][Yb
@UbXgW`UZhYb`i bX`?`i`hi fYb`[Ync[Yb`k YfXYb`"8cW`i a`Ui g`XYb
fUhhYfbXYb`K U[[cbg`i bX`[YgW`ÅZh][Yb`6U`b`ÖZYb`Y]b`9f`YVb]g`ni
a UWYbž`XUg` : fYi XY`ghUhh`GhfYgg`Vf]b[hž`VYXUfZYg`Y]b][Yf
JcfVYfY]hi b[`i bX`_`i [Yf`9bhgW`Y]Xi b[Yb`"A]h`XYb`f]W`h][Yb
H]ddg`k]fX`X]Y` : U`fh`b]W`h`bi f`a UW`VUfž`gcbXYfb`ni `Y]bYa
<][`\`][`h`Z0f`U`Y`6YhY`][hYb`"

Ni U`YfYfgh`gc`hY`X]Y`K U`XYf`Ni [`_UggY`gcf[Z`h][`0VYfXUW`h
k YfXYbž`i a`XYb`?`ca Zcfh`Z0f`X]Y` : Ua `]`Y`ni`a`U]`ja`]YfYb`"
?`]a`Uh]g]YfhY`?`UggYb`k]Y`57`&!H]Yf`cXYf`57`!H]Yf`V]YhYb`a`Y`f
Df]j`Uhg`d`ÅfY`i bX`Fi` \Yž`k Ug`VYgcbXYfg`VY]`Ub[Yb`GhfYW`Yb`k]Y
j`cb`8Y`\"`bUW`5[fU`cXYf`A`i a`VU]`bUW` ; cU`k]W`h][`]gh`"8]YgY
5VhY]Y` \UVYb`cZh`Jcf`Åb[Y`cXYf`HfYbbk`ÅbXYž`X]Y`Y]bYb
[YgW`0hnhYb`F`Ui a`Z0f`?`]bXYf`gW`UZZYbž`i a`ni`gW`UZYb`cXYf`ni
gd]Y`Yb`" : 0f`B`UW`hZU`fhYb`Ya`dZ]Y`h`Yg`g]W`ž`i bhYfY`@]Y[Yb`ni
Vi`WYbž`XU`g]Y`hU[g0VYf`U`g`G]hnd`ÅhnY`X]YbYb`i bX`XYb`?`]bXYfb
a`Y`f`6Yk`Y[i b[gZfY`\Y]h`[YVYb`"8]Y`6i`W`i b[`gc`hY`Zf0`nY]h][
YfZc`[Ybž`XU`X]YgY`D`ÅhnY`gW`bY`j`Yf[f]ZZYb`g]bXž`VYgcbXYfg`]b
XYf`<`Ui`dhfY]gYnY]h`ink`]gW`Yb`C`_hcVYf`i bX`A`Åfn`"

8]Y`5i`gk`U\`XYf`F`ci`hY`gd]Y`h`YVYbZU`g`Y]bY`[`fc»`Y`F`c`Y`Ži`a`X]Y`
F`Y]gY`_]bX[`Y`fY`W`h`ni`[`Y`ghU`hYb"?`ØfnY`fY`GhfY`W`Yb`c`XYf`
HU[`Y`gZU`f`hYb`ž`k`]Y`X]Y`j`c`b`š]di`f`b`UW`5[`fU`ž`g]bX`c`Z`h`k`Yb][`Y`f`
Ub`ghf`Yb[`Y`b`X`i`b`X`V]Y`hYb`X`i`f`W`X`Y`Y`Y`b`ghY`f`gd`Ub`b`Y`b`X`Y`5`i`g`V`]W`Y`
Ui`Z`8`Ø`f`Z`f`i`b`X`Y`X`Y`f`ž`X`Y`?`]b`X`Y`f`Z`U`gn]b]Y`f`Y`b`_`Ö`b`b`Y`b`"`F`c`i`h`Y`b`k`]Y`
X]Y`X`Y`g`c`X`Y`b`Y`b`8`f`Y]Y`W`_`g`f`B`Y`\\`ž`š]di`f`ž`5[`fU`ž`g]bX`X]X`Y`U`ž`X`U`g]Y`
`i`h`i`f`Y`Y`<`Ø`Y`di`b``h`Y`k`]Y`X`U`g`HU`^`A`U`U`a`]h`Ø`V`Y`fg`W`Ui`V`U`f`Y`b`
:`U`f`n`Y]h`Y`b`j`Y`f`V]b`X`Y`b`"`B`U`W`h`n`Ø[`Y`_`Ö`b`b`Y`b`n`k`U`f`N`Y]h`gd`U`f`Y`b`ž`
g`c`h`Y`b`U`V`Y`f`b`i`f`[`Y`k`Å`h`k`Y`f`X`Y`b`ž`k`Y`b`b`X]Y`?`]b`X`Y`f`U`b`F`Y]g`Y`b`
[`Y`k`Ø`b`h`g]b`X`i`b`X`i`b`[`Y`k`c`b`h`Y`f`l`a`[`Y`V`i`b`[`g`W`U`Z`Y`b`_`Ö`b`b`Y`b`"
D`U`h`ž`c`f`a`Y`b`k`]Y`:
Ua`]Y`b`!
F`Y]g`Y`b``V`Y`h`c`b`Y`b`ž`k`]Y`k`]W`h][`Y`g`]g`h`ž`
F`Y]g`Y`b`Ui`Z`X]Y`6`Y`X`Ø`f`Z`b]g`g`Y`j`c`b`?`]b`X`Y`f`b`U`V`n`i`g`h]a`a`Y`b`ž`i`b`X`
V]Y`h`Y`b`b`gd]f`U`h]c`b`Z`Ø`f`Z`U`a`]Y`b`Z`f`Y`i`b`X`]W`X`Y`5`V`Y`b`h`Y`i`Y`f`k`Y`h`k`Y`h`"

8]Y`J`Y`fd`Z`Y[`i`b[`U`b`6`c`f`X`Y`f`Z`c`f`X`Y`f`h`V`Y`g`c`b`X`Y`f`Y`5`i`Z`a`Y`f`_`g`U`a`_]h`ž`
X`U`?`]b`X`Y`f`Y`a`d`Z]b`X`]W`X`Y`f`U`i`Z`i`b[`Y`k`c`b`h`Y`g`9`g`g`Y`b`f`Y`U[`]Y`f`Y`b`
_`Ö`b`b`Y`b`"`b`\\`Ø`Y`f`Y`b`?`U`g`g`Y`b`g]b`X`A`U`n`Y]h`Y`b`c`Z`h]a`H]W`Y`h`d`f`Y]g`
Y`b`h`U`h`Y`b`ž`X`c`W`X`Y`E`i`U`]h`Å`h`i`b`X`K`Ø`f`n`Y`_`Ö`b`b`Y`b`j`U`f]]Y`f`Y`b`"9`g`]g`h`
f`U`h`g`U`a`ž`j`Y`f`h`U`i`h`Y`G`b`U`W`_`g`k`]Y`?`Y`_`g`Y`ž`H`f`c`W`Y`b`Z`f`Ø`W`h`Y`c`X`Y`f`6`f`c`h`
a`]h`n`i`V`f]b[`Y`b`ž`i`a`Ui`Z`d`Ø`h`n`]W`X`Y`b`<`i`b[`Y`f`c`X`Y`f`k`Å`Y`f]g`W`X`Y`9`g`g`Y`f`
j`c`f`V`Y`f`Y]h`Y`h`n`i`g`Y]b`" <`Å`b`X`Y`f`U`b`6`U`b`b`\\`Ø`Z`Y`b`V]Y`h`Y`b`n`k`U`f`G`U`a`c`g`U`g`
c`X`Y`f`f`Ø`W`h`Y`U`b`ž`X`c`W`g`c`h`Y`a`U`b`b`i`f`Z`f]g`W`X`n`i`V`Y`f`Y]h`Y`h`Y`c`X`Y`f`
j`Y`f`d`U`W`_`h`Y`D`f`c`X`i`_`h`Y`k`Å`Y`b`i`b`X`U`i`Z`<`m[`]Y`b`Y`U`W`X`h`Y`b`"5`V[`]Y`Z`Ø`h`Y`g`
K`U`g`g`Y`f`]g`h`Y]b`A`i`g`g`ž`X`U`@`Y]h`i`b[`g`k`U`g`g`Y`f`b]W`X`h`h`f]b`_`V`U`f`]g`h`ž`i`b`X`
Y]b`Y`_`Y]b`Y`?`Ø`\\`V`c`l`_`U`b`b`\\`Y`Z`Y`b`ž`i`Y`h`f`Å`b`_`Y`i`b`X`G`b`U`W`_`g`Z`f]g`W`X`n`i`
\\`U`h`Y`b`"

I`b`h`Y`f`\\`U`h`i`b[`]Z`Ø`f`X]Y`?`]b`X`Y`f`]g`h`Y]b`k`Y]h`Y`f`Y`f`G`W`X`Ø`g`g`Y`ž`i`a`U`b[`Y`
:`U`f`h`Y`b`U`b[`Y`b`Y`\\`a`n`i`[`]Y`ghU`h`Y`b`"?`Y`]b`Y`G`d]Y`Y`ž`6`Ø`W`X`Y`f`c`X`Y`f`
H`U`V`Y`h`g`a`]h`?`c`d`Z`Ø`f`Y`f`b`_`Ö`b`b`Y`b`@`U`b[`Y`k`Y]Y`j`Y`f`h`f`Y]V`Y`b`ž`c`b`Y`
U`b`X`Y`f`Y`A`]h`f`Y]g`Y`b`X`Y`n`i`g`h`Ø`f`Y`b`"9`g`c`b`h`g]W`X`U`i`W`X`ž`g]Y`U`i`Z`X]Y`
F`Y]g`Y`j`c`f`n`i`V`Y`f`Y]h`Y`b`ž`i]b`X`Y`a`a`U`b`i`b`Y`b`j`c`b`X`Y`b`C`f`h`Y`b`Y`f`n`Å`h`ž`
X]Y`g]Y`g`Y`\\`Y`b`k`Y`f`X`Y`b`Y`h`k`U`j`c`a`DU`U`g`h`X`Y`f`K`]b`X`Y`]b`š]di`f`c`X`Y`f`
X`Y`b`G`h`f`Å`b`X`Y`b`j`c`b`i`c`U`":`Y`b`gh`Y`f`d`Å`h`n`Y`V]Y`h`Y`b`Y`]b`Y`b`U`h`Ø`f`]W`X`Y`
5`V`Y`b`_`i`b[`]ž`X`U`X]Y`j`c`f`V`Y]n]Y`\\`Y`b`X`Y`@`U`b`X`g`W`U`Z`h`ž`j`c`b`?`Ø`Y`b`U`i`Z`
X`Y`b`Y`X`Y`f`b`V]g`n`i`V`i`b`h`Y`b`A`Å`f`_`h`Y`b`ž`c`Z`h`k`]Y`Y]b`Y`V`Y`b`X][`Y`g`
6]X`Y`f`V`i`W`X`k`]f`_`h`"?`i`f`n`Y`G`d`U`n]Y`f[`]Å`b[`]Y`]a`K`U[`]c`b`ž`k`Y`b`b`X`Y`f`N`i`[`
\\`Å`h`ž`_`Ö`b`b`Y`b`n`i`X`Y`a`\\`Y`Z`Y`b`ž`i`Ø`V`Y`f`g`W`Ø`g`g][`Y`9`b`Y`f[`]Y`U`V`n`i`V`U`i`Y`b`"

G]W Yf\Y]h'gc`hY`cVYfghY`Df]cf]hÅh\UVYbž`VYgcbXYfg`]b`XYb
W Uch]gW Yb`6U\ b\ÖZYb`i bX`ØVYfZØ`hYb`NØ[Yb`"?]bXYf`gc`hYb
ghYhg`]b`XYf`BÅ\Y`XYf`9`hYfb`V`Y]VYbž`]XYU`Yfk`Y]gY`a`]hY]bYa
_`Y]bYb`Fi`W_gUW_ž`XYf`k`]W`h[Y`8`]b[Y`k`]Y`K` UggYf`i` bX`Y]bYb
B`chZU``_c`b`hU`_h`Y`b`h`Å`h`" `#`XYf`;` Y`b`Y`f`U`7`Ugg`c`XYf`VY`]`G`Y`Y`d`Y`f`
7`Ugg`c`b`Y`?` `]a` U`U`b`U`[Y`_`U`b`b`Y`g`Y`b`[`k` Y`f`X`Y`b`ž`k` Y`g`U`V`Y`g`
g`]b`b`j`c``]`ghž`;` Y`d`Å`W`_`g`c`i`n`i` `j` Y`f`g`h`U`i` Y`b`ž`X`U`g`g`Y`g`b`]W`h`i`n`i` f`
G`h`c`d`Y`f`Z`U``Y`k`]f`X``G`W`_`Ø`g`g`Y`f`Z`Ø`f`H`U`g`W`Y`b`i` b`X`F`i` W`_`g`Å`W`_`Y`g`W`Ø`h`n`Y`b`
j`c`f`8`]Y`V`g`h`U`_`ž`i` b`X`Y`g`]`g`h`_`]`Z`f`Y`W`_`ž`X`Y`?`]b`XYf`U`i` Z`Y`]b`Z`U`W`Y`
J`Y`f`U`h`Y`b`g`f`Y`[Y`b`k`]Y`X`U`g`B`]W`h`!`5`b`g`d`f`Y`W`Y`b`j`c`b`:`f`Y`a` X`Y`b`c`b`Y`
9`h`Y`f`b`_`]b`n`i`k`Y`]g`Y`b`"

8`Y`F`Y`]g`Y`n`Y`]h'gc`hY`a`]h`6`Y`X`U`W`h`[Y`k` Å`_`h`k` Y`f`X`Y`b`ž`i` a`_`X`U`g`
K`c`\`V`Y`Z`]b`X`Y`b`X`Y`f`:`U`a`]`Y`n`i`_`[Y`k` Å`_`f`Y`]g`h`Y`b``8`]Y`A`c`b`U`h`Y`C`_`h`c`V`Y`f`
V`]g`A`Å`f`n`V`]Y`h`Y`b`a`]`X`Y`g`K` Y`h`Y`f`ž`k` U`g`V`Y`g`c`b`X`Y`f`g`Z`Ø`f`?`]b`X`Y`f`
U`b`[Y`b`Y`_`a`_`]`ghž`X`U`Y`i`h`f`Y`a` Y`<`]h`n`Y`c`X`Y`f`A`c`b`g`i`b`f`Y`[Y`b`j`Y`f`a`]Y`X`Y`b`
k`Y`f`X`Y`b``?`Ø`f`n`Y`f`Y`:`U`\`f`h`Y`b`c`X`Y`f`N`k`]g`W`Y`b`g`h`c`d`d`g`ž`Y`h`k`U`]b`G`h`Å`X`h`Y`b`
k`]Y`i`X`U`]d`i`f`ž`X`U`g`a`]h`g`Y`]b`Y`b`G`Y`Y`b`i` b`X`D`U`Å`g`h`Y`b`U`i`W`_`Z`Ø`f`?`]b`X`Y`f`
g`d`U`b`b`Y`b`X`_`]`ghž`_`Ø`b`b`Y`b`X`]Y`F`Y`]g`Y`U`i`Z`c`W`_`Y`f`b``9`g`]`g`h`f`U`h`g`U`a` ž`
D`i`Z`Y`f`n`Y`]h`Y`b`Z`Ø`f`J`Y`f`g`d`Å`h`i`b`[Y`b`Y`]b`n`i`d`_`U`b`Y`b`ž`X`U`X`]Y`g`Y`]b`#`X`]Y`b`
`Y`]b`Y`G`Y`h`Y`b``Y`]h`g`]b`X`ž`i` b`X`g`h`Y`h`g`Y`]b`Y`_`Y`]b`Y`F`Y`]g`Y`U`d`c`h`_`Y`_`Y`a`]h`
A`Y`X`_`U`a`Y`b`h`Y`b`[Y`[Y`b`:`]Y`V`Y`f`c`X`Y`f`A`U`[Y`b`V`Y`g`W`k`Y`f`X`Y`b`X`U`V`Y`]n`i`
\`U`V`Y`b`"

9`]b`c`Z`h`Ø`V`Y`f`g`Y`_`Y`b`Y`f`5`g`d`Y`_`h`]`g`h`X`]Y`_`i`_`h`i`f`Y``Y`G`Y`b`g`]V`]`g`]Y`f`i`b`[`X`Y`f`
?`]b`X`Y`f`j`c`f`X`Y`f`F`Y`]g`Y``#`X`]g`W`Y`N`Ø`[Y`i` b`X`6`U`_`b`_`_`Ö`Z`Y`g`]b`X`j`c``Y`f`
@`V`Y`b`ž`;` Y`f`Å`i`g`W`Y`i`b`X`:`U`f`V`Y`b`ž`k`U`g`Z`Ø`f`†`b`[Y`F`Y`]g`Y`b`X`Y`
Ø`V`Y`f`k`Å`h`[Y`b`X`g`Y`]b`_`U`b`b``G`]Y`X`U`f`U`i`Z`j`c`f`n`i`V`Y`f`Y`]h`Y`b`ž`X`U`g`g`
A`Y`b`g`W`Y`b`a`Y`b`[Y`b`ž`<`Å`b`X`Y`f`i`b`X`i`b`[Y`k`c`\`b`h`Y`G`n`Y`b`Y`b`k`]Y`?`Ø`\Y`
U`i`Z`X`Y`b`:`_`Y`]g`Y`b`b`c`f`a`U`_`g`]b`X`ž`\`]Z`h`ž`Y`b`[g`h`Y`n`i`f`Y`X`i`n`]Y`f`Y`b``?`_`Y`]b`Y`
;`Y`g`h`Y`b`k`]Y`X`U`g`@`Y`f`b`Y`b`Y`]b`Y`g`Y`]b`Z`U`W`Y`b`B`U`a`U`g`h`Y`_`_`Ø`b`b`Y`b`
n`i`X`Y`a`_`H`Ø`f`Y`b`_`Ö`Z`b`Y`b`i`b`X`Z`f`Y`i`b`X`]W`Y`_`#`h`Y`f`U`_`h`]c`b`Y`b`a`]h`
9`]b`\Y`]a`]g`W`Y`b`Z`Ø`f`X`Y`f`b`ž`X`]Y`?`]b`X`Y`f`c`Z`h`a`]h`Y`]b`Y`a`_`@`Å`W`Y`b`
V`Y`[f`Ø`»`Y`b`"

A`]h`X`]Y`g`Y`b`_`V`Y`f`Y`[i`b`[Y`b`]a`_`:`Y`d`Å`W`_`k`]f`X`Y`]b`Y`N`i`[f`Y`]g`Y`X`i`f`W`
#`X`]Y`b`Z`Ø`f`:`U`a`]`Y`b`n`i`_`Y`]b`Y`a`_`9`f`Y`V`b`]g`ž`X`U`g`b`]W`h`b`i`f`a`U`W`V`U`f`ž`
g`c`b`X`Y`f`b`V`Y`f`Y`]W`Y`f`b`X`_`]`g`h``K`Å`\`f`Y`b`X`X`]Y`G`W`]Y`b`Y`b`X`i`f`W`_`X`]Y`k`Y`]h`Y`b`

@UjXgW UZhYb`Z0\ fYbž`ÖZbYh'g]W\`Y]bY`K`Y`h'j`c``Yf`9bhXYW`i`b[`Ybž`X]Y`gck`c``Z0f`?`]bXYf`U`g`Ui`W\`Z0f`9fk`UW\gYbY`[``Y]W\Yfa`U»`Yb`ZUgn]b]YfYbX`V`Y]Vh"

6YgcbXYfY`9f`YVb]ggY`i`bX`J`YfUbghU`hi`b[`Yb



<]bhYf`XYa`[``Y]W\`a`À»][`Yb`F`UhhYfb`XYf`F`ÀXYf`j`YfV]f[`h'g]W\`]b`
≠X]Yb`Y]bY`K`Y`h'j`c``Yf`Ui`»`Yf[`Yk`Ö\b`]W\Yf`6U\bYf`YVb]ggYž`X]Y`
k`Y]h'ØVYf`XUg`U`hÀ[``]W\Y`F`Y]gYb`\\]bUi`g[`Y\Yb``J`cb``i`|`|`f]ÖgYb`
:`U\fhYbž`X]Y`Ub`X]Y`DfUW\h'j`Yf[`Ub[`YbYf`A`U\UfU`Ug`Yf]bbYfbž`V]g`
\]b`ni`Y]bn][`Ufh][`Yb`9j`Ybhgž`X]Y`_i`hi`fY``Y`GW\`ÀhnY`Ui`Z`GW\]YbYb`
ZY]Yfbž`V]YhYh`XUg`@UbX`Y]bY`:`Ø``Y`Ub`VYgcbXYfYb`Ni`[`fY]gYbž`X]Y`
XUg`<`Yfn`YXYg`5VYbhYi`fYfg`\`Ö\YfgW\`U[`Yb`UggYb``8]YgY`
9f`YVb]ggY`g]bX`b]W\h'bi`f`:`cfhVYk`Y[`i`b[`ž`gcbXYfb`k`U\`fY`
NY]hfY]gYb`Xi`fW\`:`YgW\]W\hY`i`bX`HfUX]h]cb"

9]bYf`XYf`<`Ö\Ydi`b_hY`]gh`XYf`A`U\UfU`Ug`9l`dfYggž`cZhi`U`g`Y]bYf`
XYf`i`|`|`f]ÖgYghYb`NØ[`Y`XYf`K`Y`h'[`YZY]Yfhi`bX`a`Y\`fZUW\`
Ui`g[`YnY]W\`bYh`A`]h'gY]bYb`c`di`YbhYb`5VhY]`Ybž`XUfi`bhYf`Y]bY`
DfÄg]XYbhYbgi`]hY`a`]h'nk`Y]`GW\`UZh]a`a`Yfbž`j`Yfgdf]W\h`X]YgYf`Ni`[`

Y]bY'FY]gY'jb'_Öb][`jWYa`Gh]"`8]Y'Fci hY'j cb'A i a VU]'bUW`8Y`\
ZØ\fh'Xi fW`UhYa VYfUi VYbXY'@UbXgWUZhYb'i bX`_i`hi fY`Y
NYbhYb'k]Y'I XU]di f'Ua`D]Wc`U!GYY'i bX`
i bj Yf[Ygg`]WYb'Ghcdd'Ua`HU^A U\U`]'b`5 [fU`'5b`6cfX`Yfk UfhYb
FY]gYbXY`YI ei]g]hY`GdY]gYbž'dYfgÖb`]WYf`GYfj]W`i bX`[YZØ\fhY
5i gZØ[Yž`Yhk U`ni a`F Ubh\Ua`VcfY!BUh]cbU`dUf_ž`k c'a Ub`H][Yf`]b
ZfY]Yf`K]`XVU\`b`YfgdÄ`Yb`_Ubb`"Gc`W`Y]b`9f`YVb]g`j Yfk UbXY`h
Y]bY`Y]bZUWY` : U\fh`]b`Y]bY`FY]gY`Xi fW`X]Y`DfUW`h`]bX]gWYf
 : ØfghYb`Äi`gYf"

9VYbZU`g`i bj Yf[Ygg`]W`]gh`XYf`DU`UW`cb`K` \YY`gž`XYf`Xi fW`X]Y
K ØghYb`i bX`DU`ÄghY`F U`Ugh`Ubg`[`Y]hYh"8]YgY`g]YVYbHÄ[] [Y
Fi bXfY]gY`ghUfhYh`]b`8Y`\
I XU]di fž`VYj cf`g]Y`a`]h`XYa`HU^A U\U`]'b`5 [fU`]\fYb`_fÖbYbXYb
5VgW`i gg`Z]bXYh"8]Y`bcghU`[]gWY`5ha`cgd`ÄfY`XYf`K U[[cbgž
[YdUUfh'a`]h`i I i f]ÖgYa`?ca`Zcfhž`Äggh`X]Y` ; ÄghY`]b`X]Y`YfU`XYf
A U\UfU`Ug`Y]bhUi`W`Yb`"6YgcbXYfY`<][` \][` \hg`g]bX`bÄW`h`]WY
 : U\fhYb`Xi fW`X]Y`K ØghY`H`Uf`i bX`6Ygi`W`Y]a`?Yc`UXYc!
BUh]cbU`dUf_ž`Y]bYa`DUfUX]Yg`ZØf`Jc[Y`VYcVUW`hYf" : Øf
XYhU]`]YfhY`
g]W`Y]b`6`]W`_Ui`Z`@chi`g`HfUj`Y`ž`k`c`X]YgY`i bX`UbXYfY
@I i gfY]gYb`Ui`gZØ`f`]W`VYgW`f]YVYb`k`YfXYb"

: Øf`YbYž`X]Y`XYb`GØXYb`
; c`XYb`7`Uf]ch`Y]bY`ZUgn]b]YfYbXY`FY]gY`Xi fW`\
Xi fW`A`mgcfYž`<Ua`d]`i bX`gW`]Y`»`]W`bUW` ; cUž`a`]h`5VghYW`Yfb
ni`Ubh`_Yb`HYa`dY`b`]b`<U`YV]X`i bX`GUZUf]g`]a`6UbX]di`f!
BUh]cbU`dUf`"8Yf`Ni [`gY`Vgh`]gh`Y]b`fc`YbXYg`A`Y]ghYfk`Yf`_a`]h
Y`Y[Ubh`Ui`g[YghUhhYhYb`?UV]bYb`i bX`@ci`b[Ygž`X]Y`XYb`?ca`Zcfh
Y]bYg` : ØbZ]GhYfbY!<chY`g`V]YhYb"9]b`VYgcbXYfYg`9j`Ybh`Ub`6cfX
]gh`XYf`6c`mk`ccX!5VYbXž`XYf`X]Y`FY]gY`a`]h`A`i`g]_i`bX`HUbn
UVfi`bXYh`i bX`XYb`_i`hi`fY`Yb`FY]W`hi`a`XYg`@UbXYg`ZY]Yfh"

9]b`k`Y]hYfYg`9f`YVb]gž`XUg`a`Ub`b]W`h`j`YfdUggYb`gc`hYž`]gh`XYf
8Uf`Y`]b[`<]a`U`Um`Ub`F`U]`k`Um`Hcm`HfU]bž`Y]b`I`B`9G7C!
K`Y`h`_i`hi`fYfVYž`XUg`Xi`fW`X]Y`a`U`Yf]gW`Yb`<Ø[Y`XYg`<]a`U`Um`Ug
gW`bUi`Zh"8]YgY`GW`a`U`gdi`fVU`bž`X]Y`j`cb`BYk`
g`dU][`i`f]`bUW`

8Uf'YY`b[`Z0\fhz`V]YhYh'gdY_hU_i `AfY`5i gV`W_Y`Ui ZHYYd`UbhU[Yb
i bX'gWbYYVYXYW_hY';]dZY`"6YgcbXYfg`k A`fYbX`XYg`8Uf'YY`b[
HYU': Ygh]j U`gz`XUg`A`f`W`]a `Bcj Ya VYf`ghUhhZ]bXYh`k]fX`X]Y
: U\fh'ni `Y]bYa ` _i `hi fY`Yb`9fY][b]g"FY]gYbXY`_ObbYb`Ub
JYf_cghi b[Yb`hY]`bY\`a Yb`i bX`a Y`f`ØVYf`X]Y'; YgW]W`hY`XYg
HYYUbVUi g`YfZU`fYb`žk A`fYbX`XYf`Ni [` [Ya A`W`]W`Xi fW`X]Y
[fØbYb`H`A`Yf`hi W_Yfh"

Ni `XYb`gU]gcbU`Yb`<][\`][\hg`nA`h`Ui W`X]Y`FY]gY`a]h`XYa
8YVWUb`C XmggYm`k A`fYbX`XYg`8]k U]!: YghYgž`XYa `]bX]gW`Yb
@]W`hYfZYghz`XUg`a Y]gh]a `C`_hcVYf`cXYf`Bcj Ya VYf`[YZY]Yfh`k]fX"
8]YgYf`@ | i gni [žXYf`Fci hYb`Xi fW`A U`UfUg`hfU`i bX`XUfØVYf
\]bUi g`UbV]YhYhž`j Yfk UbXY`h]g]W`k A`fYbX`X]YgYf`NY]h]b`Y]bY
6Ø\`bY`ZØf`ZYgh]W`Y`8Y`_cfUh]cbYb`i bX`VYgcbXYfY`Dfc[fUa`a`Y"
8]Y': U\fhž`Yhk U`j cb`A`i`a`VU]`bUW`]; cUž`k]fX`Xi fW`_i `hi fY`Y
8UfV]Yhi b[Yb`i bX`ZYgh]W`Y`A`YbØg`VYfY]W`Yfhz`X]Y`XYb`; Y]gh]j cb
8]k U`]Y]bZUb[Yb`"Gc`W`Y`9j`YbHg`V]YhYb`Y]bY`Y]bn][Ufh][Y
; Y`Y[Yb`Y]hž]bX]gW`Y`HfUX]h]cbYb`U`i`hbU`ni`Yf`VYbž`k A`fYbX
a`Ub]b`i`i`f]ØgYa`?ca`Zcfh`fY]gh"

9]bY`k`Y]hYfY`ZUgn]b]YfYbXY`C`dh]cb`]gh`X]Y`HY]`bU`a`Y`Ub
h\Ya`Uh]gW`Yb`FY]gYbž`X]Y`j`cb`XYf`X]Ub`F`U]`k`Umg`cXYf`df]j`UhYb
5bV]YhYfb`cf[Ub]g]Yfh`k`YfXYbž`k]Y`Yhk`U`gd]f]hi`Y`Y`Hci`fYb`ni
\Y]`][Yb`Gh`A`hYb`"8Yf`A`U`UdUf]b]f] Ub`9i`dfYggž`Ui`W`VY`_Ubbh`U`g
6i`XX\]gh`7]fW`]h`HfU]bž`ZØ\`fh'ni`k`]W`h][Yb`Gh`A`hYb`XYg
6i`XX\]ga`i`g`k`]Y`6cX\`; UmU`i`bX`GUfbU`h`"8]YgY`FY]gYž`X]Y`c`Zh
a`]h[YZØ\`fhYb`A`YX]hUh]cbYb`i`bX`J`c`hfA[Yb`Yf[A`bnh`k]fXž`V]YhYh
Y]bY`h]YZ[Y`YbXY`_i`hi`fY`Y`9fZU`fi`b[ž`X]Y`VYgcbXYfg`ZØf
gd]f]hi`Y`Y`X`hYfYgg]YfhY`i`bj`Yf[Ygg`]W`V`Y]Vh`"Gc`W`Y`gdYn]Y`Yb
: U\fhYb`g]bX`c`Zh`nY]h]W`VY[fYbnh`i`bX`YfZcfXYfb`Y]bY`ZfØ`nY]h][Y
6i`W`i`b["

8]YgY`VYgcbXYfYb`Ni [fY]gYb`i`bX`9j`YbHg`g]bX`k]Y': YbghYf`]b`X]Y
GYY`Y`X]Ybž`X]Y'; YgW]W`hYž`@ | i g`i`bX`HfUX]h]cb`Ui`Z
Y]bn][Ufh][Y`K`Y]gY`j`YfV]bXYb`"C`V`a`Ub]b`XYb`_Ob][`]W`Yb
K`U[[cbg`XYg`A`U`UfU`Ug`9i`dfYgg`X]Y`DfUW`h]j`Yf[Ub[YbYf`NY]hYb
Yf`YVh`cXYf`]a`Hcm`HfU]b`X]Y`fi`][[Y`GW`Ob`Y]h`XYf`<]a`U`UmUg
Yb`hXYW`h`Y`XY': U\fh`Yfn`A`h`Y]bY`Y][YbY'; YgW]W`hYž`X]Y`XUfUi`Z

k UfhYhž'Yf'YVh'ni 'k YfXYb"

: Un]h'i bX'dYfgÒb`]W\Y'9a dZY\`i b[Yb



K Ybb`X]Y`F Y]gY`Xi fW`ϕX]Yb`Ui ZGW\YbYb`ni `9bXY`[Y\hž`V`Y]Vh
XYf`BUW\U``XYg`5VYbhYi Yfg` `Y]b`A cgU]_`Ui g`9]bXfØW_Ybž`XUg
j cb`fUhhYfbXYb`K U[[cbgž`Vi bhYb`@UbXgW\UZhYb`i bX`Yfn`]W\Yb
6Y[Y[bi b[Yb`[YdfÀ[h`]gh`9]bY`Ni [ZU\fh]b`X]YgYa `@UbX`ÒZbYh
HØfYb`ni `Y]bYf`K Y`hj c``Yf`?cbhfUghYž`k c` ; YgW\W\hY`i bX
A cXYfbYž`@ I i g`i bX`9]bZUW\Y]h`bYVYbY]bUbXYf`VYghY\Yb``I a
XUg`6YghY`Ui g`gc`W`Y]bYa `9f`YVb]g`YfUi gni `c`Ybž`c`b`hYg`g]W\ž
X]Y`nYbhfU`Yb`5gdY`_hY`ja `6`]W`ni `VY\U`hYb`i bX`Y]b][Y
dYfgÒb`]W\Y`F UhgW`À[Y`ni `VY\Yfn][Ybž`X]Y`XYb`K Y[`VYfY]W\Yfb
_ÒbbYb"

8 Ug`<YfnghØW`YXYf`F Y]gY`a]h`XYf`ϕX]Ub`F U]k Umg`]gh`X]Y
ja a YbgY`J]Y`ZU`hž`X]Y`gck c`\`]b`XYb`F ci hYb`U`g`Ui W`]b`XYb
Ni [hmdYb`ghYW`_h`J cb`XYb`i I i f]ØgYb`: U\fhYb`ja `A U\UfU`Ug
9I dfYgg`cXYf`DU`UW`cb`K \YY`gž`X]Y`Xi fW`F U`Ugh\Ub`cXYf`XUg
; c`XYbY`8fY]YW`_ZØ`fYbž`V]g`\]b`ni `Ui h\Ybh]gW\Yb`9f`YVb]ggYb`]b

XYf'G`YYdYf'7`Uggž'k c'a Ub`XYb`Di`g`XYg'5`hU[g'gdØfh'`X]Y
A Ò[`]W_X]hYb`g]bX`bU\Yni`i bVY[fYbnh"6YgcbXYfg
Ya dZY\`Ybgk Yfh'g]bX`GhfYW_Yb`k]Y`X]Y`j cb`8Y`\`]bUW`5[fUž'i a
XUg`HU^A U`U`ni`VYghUi bYbž'cXYf`X]Y`a U`Yf]gW`Y` : U\fh'a]h`XYa
Hcm'HfU]b`bUW`8Uf`YY`]b[ž`X]Y`Xi fW`X]Y`<Ø[Y`XYg`<]a U`UmUg
ZØ\fh"8]YgY`Fci hYb`V]YhYb`b]W`h`bi f`j]gi Y`Y`<][\`][\hgž'gcbXYfb
Ui W`_i`hi fY`Y`H]YZYž`X]Y`YXY` : U\fh'i bj Yf[Ygg`]W`a UW`h"

9]b`k Y]hYfYf`k]W`h][Yf`Di b`_h]gh`X]Y`D`Ubi b[ž`X]Y`XYb`i bhYfgW`]YX
nk]gW`Yb`GhfYgg`i bX` ; Ybi gg`Ui ga UW`h"8]Y`VYghY`F Y]gYnY]h`]Y[h
nk]gW`Yb`C`_hcVYf`i bX`A`Āfnž`k Ybb`XUg`?`]a U`a]`X`]gh`i bX`X]Y
<]hY`XYg`Gca`a Yfg`cXYf`XYf`A`cbgi bfY[Yb`ZY`\`Yb`"H]W_Yhg`gc`hYb
ZfØ\nY]h][`[YVi W`h`k YfXYbž`VYgcbXYfg`ZØf`VY`]YVhY`GhfYW_Yb`cXYf
@i`i gnØ[Yž`XU`D`ĀhnY`gW`bY`j Yf[f]ZYb`g]bX`"D`UhhZcfa Yb`k]Y`X]Y
cZZ]n]Y`Y`≠ 7H7!K YVgY]hY`cXYf`5bV]YhYf`k]Y`6U\`bfY]gYb`"XY
V]YhYb`k Yfhj`c`Y`i bhYfghØhni b[`VY]`XYf`C`f[Ub]gUh]cb`i bX`]YZYfb
H]ddg`ni`]bX]j]Xi Y`Yb`F Y]gYj Yf`Āi ZYbž`gY]Yg`ZØf`XUg` ; c`XYbY
8fY]YW`_cXYf`UV[Y`Y[YbY`F Y[]cbYb`k]Y`i XU]di fž`XUg`cZi`U`g
J YbYX][`XYg`C`ghYbg`VYnY]W`bYh`k]fX"

G]W`Yf\Y]h`i bX`?ca Zcfhj YfX]YbYb`YVYbZU`g`6YUW`hi b[ž`i a`X]Y
F Y]gY`gcf[YbZfY]`ni`[YghU`hYb`"?`]a Uh]g]YfhY`?`UggYb`k]Y`57`&!H]Yf
cXYf`57`"!H]Yf`V]YhYb`a Y\`F`i`Y`i bX`Df]j Uhgd`\ĀfYž`k Ug
VYgcbXYfg`VY]`Ub[Yb` : U\fhYb`cXYf`ZØf` : Ua`]`Yb`j cb`J`cfhY]`]gh"
K YfhgUW`Yb`gc`hYb`ghYhg`[Yg]W`Yfh`k YfXYbž`XU`HUgW`YbX]YVghU\`
Ub`VY`YVhYb`6U\`b`\ØZYb`k]Y`A`i`a`VU]`cXYf`8Y`\`]j cf`_ca`a`h"
 ; Ygi bX\Y]h]W`_]gh]J`c`fg]W`h`VY]`9ggYb`i bX`Hf]b`_Yb`[YVchYb`
UV[YZØ`hYg`K`UggYf`i bX`Zf]gW`ni VYfY]hYhY`GdY]gYb`j cb`<ĀbX`Yfb
a`]b]a`]YfYb`F`]g]_Yb`"9]bY`_`Y]bY`F`Y]gYUdch\Y`_`Y`a`]h`A`]hY`b`[Y[Yb
A`U[YbVYgW`k YfXYb`cXYf` :]YVYf`]gh`Y]b`A`i`ggž`XU`a`YX]n]b]gW`Y
J Yfgcf[i b[`i bhYfk Y[g`VY[fYbnh`gY]b`_Ubb"

5i g`dYfgØb`]W`Yf`9fZU\fi b[`fUhY`]W`ž`X]Y`F Y]gY`a`]h`cZZYbYb`5i [Yb
i bX`Y]bYa`c`ZZYbYb`<YfnYb`Ubni [Y\Yb`"8]Y`6Y[Y[bi b[Yb`a`]h
9]b\Y]a`]gW`Ybž`gY]Yg`ØVYf`Y]bYb`[YhY]`hYb`7\U]`cXYf`Y]b
gdcbhUbYg` ; Ygd`ĀW`_]b`XYf`G`YYdYf`7`Uggž`g]bX`cZi`X]Y
k Yfhj`c`ghYb`A`ca`YbhY`"DUW_Y` ; YXi`X`Y]bž`XYbb`J Yfgd`Āhi b[Yb
g]bX`_Y]bY`GY`hYb\Y]hž`i bX`bi`hnY`X]YgY`NY]hž`i a`X]Y`5ha`cgd`\ĀfY

Ub'6U\ b\ ÒZYb'k]Y'XYa '7\ \UhfUdUh]G\]j U'HYfa]bi g']b' A i a VU]ž
Y]bYa 'I B9G7C!K Y'h_i 'hi fyfVYž'Ui Zni gUi [Yb''9]b' Bch]nVi W\cXYf
Y]bY'?Ua YfU' _Ubb'\Y'ZYbž'X]Y'ZØW\h][Yb'9]bXfØW_Y'ZYgmi \U'hYb'
j cb'XYb' [c'XYbYb'K ØghYb'F U'Ugh\ Ubg'V]g'ni 'XYb' [fØbYb' < Ø [Y'b
GØX]bX]Ybg"

9]b'k Y]hYfyf'H]dd']ghž'g]W\ 'Ui Z'X]Y' _i ']bUf]gW\Y'J]Y'ZU'h
Y]bni 'UggYbž'UVYf'a]h'6YXUW\h''8Yf'7\U]j cb'XYb' 7\U]k U''U\g
Ub'XYb'6U\ bghY][Yb']gh'Y]b' A i ggž'YVYbgc'k]Y'fY []cbU'Y'GbUW_g
k]Y'GUa cgUg'cXYf'J UXU'DUj ž'X]Y'Y]bYb'9]bV']W_]b'X]Y
GhfU» Yb_ØW\Y' [YVYb'' : Øf''Àb [Yfy' : U\fhYb''c\ bh'Yg'g]W\ž'Y][YbY
GbUW_g'a]hni Vf]b [Ybž'ZU''g'X]Y'J YfdZY [i b ['Ub'6cfX'b]W\h'XYb
9fk Ufhi b [Yb'Yb hgd]f]W\h''K Yf'@ I i gnØ [Y'k]Y'XYb' ; c'XYb'7\Uf]ch
k À\hž' _Ubb'g]W\ 'Ui ZZYgh]W\Y' A YbØg'ZFYi Ybž'X]Y'cZh'fY []cbU'Y
GdYn]U']hÀhYb'k]XYfgd]Y [Y'bž'Yhk U'Ui ZXYf'F ci hY'Xi fW\ 'A mgcFY
i bX' < Ua d]"

: Øf' : Ua]]Yb'cXYf'YbYž'X]Y'a]h'?]bXYfb'fY]gYbž'Ya dZ]Y\ 'h'Yg'g]W\ž'
_ØfnYfy'GhfYW_Yb'k]Y' ð]di f'bUW\ '5 [fU'ni 'k À\Yb' i bX
: YbghYfd'ÀhnY'ni 'g]W\Yfbž'i a 'X]Y'? 'Y]bYb'a]h'XYf
j cfVY]n]Y\YbXYb '@JbXgW\UZh'ni 'i bhYf\U'hYb''B UW\ hmØ [Y' _ØbbYb
NY]h'gdUfYbž'YfZcfXYfb'UVYf'Y]bY' [Yk]ggY'5bdUggi b [gZÀ\][_Y]h"
9VYbgc''c\ bh'Yg'g]W\ž'VYgcbXYfY'9] Yb h'g'k]Y'XUg'8]k U']! : Ygh']a
Ni ['cXYf'XUg'8Uf'YY']b ['HYU' : Ygh]j U'ni 'Yf'YVYbž'X]Y' _i 'hi fy''Y
H]YZ' i bX'ZYgh]W\Y'Gh]a a i b [']b'X]Y'FY]gY'Vf]b [Yb"

8]Y'Ò_c`c []gW\Y'8]a Ybg]cb'XYg'Ni [fy]gYbg'gc''hY'YVYbZU''g
VYXUW\h'k YfXYbž'XU'X]Y'6U\ b']a 'J Yf ['Y]W\ 'ni ' : 'i [nYi [Yb'cXYf
5i hcg'Y]bY'bUW\ \U'h][Yfy'K U\''XUfghY''h''8]Y' ðX]Ub'F U]k Umg
gYhnYb'ni bY\ a YbX'Ui Z'9'Y_hf]Z]n]Yfi b [ž'k Ug'XYb'7C !: i » UVXfi W_
fYXi n]Yfh''? 'Y]bY' ; YghYb'k]Y'XUg'J Yfa Y]XYb'j cb'D'Ugh]_a Ø`
Xi fW\ 'k]YXYfj Yfk YbXVUfY'K UggYfZUgW\Yb'j YfghÀf_Yb'X]YgYb
J cfhY]' i bX'hfU [Yb'XUni 'VY]ž'X]Y'GW\Øb\Y]h'XYf'Xi fW\ ei YfhYb
FY []cbYb'ni 'VYk U\fyb"

K À\fybX'X]Y'bÀW\ghY'9hUddY'XY]bYf'FY]gYd'Ubi b ['bÀ\Yf'fØW_hž'
V'Y]Vh'XYf' ; YXUb_Y'Ub'X]Y' i bnÀ\ [Yb' A Ø [']W\ _Y]hYbž'X]Y' ðX]Ybg
GW]YbYbbYhm'V]YhYhž'Y]b'ghÀbX][Yf'6Y ['Y]hYf'' ðXY' : U\fhž'cV']b

Y]bYa `i l i f]ÖgYb`5VhY]`cXYf`Y]bYa `Y]bZUWYb`K U[[cbž`V]f[h`XUg
J YfgdfYWYb`bYi Yf`9bhXYW_i b[Ybž`X]Y`bi f`XUfUi Z`k UfhYbž`HY]`
XY]bYf`Y][YbYb`; YgW.]W`hY`ni `k YfXYb"

E i Y``Yb

- \ hhd g. ##k k k "VU\ b fY]gYb"XY#n]Y`Y#]bX]Yb"\ ha `
- \ hhd g. ##k k k "`c hi g! hfUj Y`"W`a #ni [fY]gYb!]bX]Yb#
- \ hhd g. ##XY"a "k]_]dYX]U"cf[#k]_]#GW.]YbYbj Yf_Y\ fS]
bS=bX]Yb
- \ hhd g. ##]bX]Ugca YXUm"W`a #XY#ni [!]bX]Yb!) fci hYb#
- \ hhd g. ##XY"a "k]_]dYX]U"cf[#k]_]#@]ghY Sj cbSNi [[Uhh
i b[Yb
- \ hhd g. ##VU\ b fY]gY!
k]_] "XY#k]_]#Ni [[Uhhi b[YbS8Yi hgW`UbX
- \ hhd g. ##k k k "a m! hfUj Y`k c f`X"XY#]bX]Yb#ni [!]bX]Yb!
[i]XY#
- \ hhd g. ##k k k "]bX]Yb!XY`i l Y"W`a #ni Y[Y
- \ hhd g. ##k k k "Ui gk UYfh][Yg!Ua h"XY#XY#gYfj]W#UYbX
Yf#]bX]Yb!bcXY#]bX]Ybg]W`Yf\ Y]h!&\$) - - ,
- \ hhd g. ##]Y`!i bhYfk Y[g"XY#fY]gYn]Y`Y#]bX]Yb#g]W`Yf\
Y]h!]bX]Yb![YZUY\ f`]W`#
- \ hhd g. ##k k k "i]V_"UWUh#XY#Zgd!_i `hi f#
- \ hhd g. ##k k k "ZUa]`]Yb!fY]gYb"W`a #fY]gYhmdYb#fY]gYb!
a]h!_]bXYfb#
- \ hhd g. ##k k k "ZUa]`]Yb!fY]gYb"W`a #fY]gYhmdYb#fY]gYb!
a]h!_]bXYfb#Uzf]_U!a]h!_]bXYfb#
- \ hhd g. ##k k k "a Yf]Ub"XY#fY]gYhfYbXg#ni [fY]gYb!h]dd
g#i l i g!ni [fY]gYb!Yi fcdU!i bX!X]Y!k Y`h!Yf_i bXYb
- \ hhd g. ##k k k "fYk Y!
fY]gYb"XY#i bXfY]gYb#ni [fY]gYb"\ ha `

6Ygi WYb'G]Y'i bg'Ui Z'Y]bY!fY]gY"XY