

B chfi Z]b`DchgXUa .`Gc` \Y`ZYb`G]Y`f]W h][
]a`B chZU``°

5_hi Y`Y`Dc`nY]a Y`Xi b[Yb`i bX`B chZU``]bZcfa Uh]cbYb`Ui g
DchgXUa`Ua`%+"`\$*`&\$&).`I bZÄ`Yž`B chfi Zbi a a Yfb`i bX
9fghY`<`]`ZY"



< Ybb]b[!j cb!HfYgW_c k !GhfU» Y`- !%` ž`%((* + `DchgXUa ž
8 Yi hgW`UbX`!`5a`%+"`đ b]`&\$&) `]gh`Yg`]b`DchgXUa`k`]Y`]a`a`Yf
i`a`X]Y`G]W`Yf`Y`h`X`Yf`6Øf[Yf.]bbYb`VYgcf[h``b`X`Yf`GhUXh[UV`Yg
6Yf]W`hY`ØVYf`j`YfgW`]Y`X`Yb`Y`I`b`ZÄ`Yž`9]b`VfØW`Y`i`b`X`k`Y`hYfY
8 Y`_]`h`Yž`X]Y`X]Y`Dc`nY`]b`X`Y`b`Y`h`h`Y`b`G`h`i`b`X`Y`b`V`Y`g`W`Ä`Z`h`[`h`\\`U`V`Y`b`"
8 Ug`gh`Ä`X`h`g`W`Y`Dc`nY`]f`Y`j`]Y`f`ž`X`U`g`]b`X`Y`f`a`Un!`c`b``]b`Y`ni`Z]b`X`Y`b`]`ghž
]b`Z`c`f`a`]Y`f`h`f`Y`[`Y`a`Ä»][`Ø`V`Y`f`g`c`W`Y`J`c`f`ZÄ`Y`i`b`X`g`h`Y`\\`h`X`Y`b
6Øf[Yf.]bbYb`a`]h`k`]W`h`[`Y`b`?`c`b`h`U`_`h`X`U`h`Y`b`ni`f`J`Y`f`ZØ[i`b`["

9]b`k`]W`h`[`Y`f`5gdY`_`hž`X`Y`b`X`]Y`G`h`U`X`h`j`Y`f`k`U`h`i`b`[`Y`V`Y`b`Z`U``g
\\Y`f`j`c`f`\\`Y`V`hž`]g`h`X`U`g`f`]W`h`[`Y`J`Y`f`\\`U`h`Y`b`]a`B`chZU`""`6Øf[Yf.]bbYb
gc`h`Y`b`X`]Y`B`chfi`Zbi`a`a`Y`fb`[`Y`b`Ui`_`Y`bb`Y`b`.:`Ø`f`X`]Y`Dc`nY`]`]gh`X`Y`
Bi`a`a`Y`f`%`\$`j`c`f`[`Y`g`Y`\\`Y`b`ž`k`Ä`\\`f`Y`b`X`X`]Y`.:`Yi`Y`f`k`Y`\\`f`i`b`X`X`Y`f`

F Yhi b[gX]Ybghi bhYf'%%&ni 'YffY]WYb'g]bX"5i » YfXYa 'gh'X]Y
Bi a a Yf'ZØf'XYb 'Àfnh]WYb'6YfY]hgW UZhX]Ybghi bhYf'%%* '%%+
'XYfnY]hj YfZØ[VUf"K Y]hYfY'k]W h][Y'Bi a a Yfb'k]Y'XYf
;]Zhchfi Zg]bX'i bhYf'\$' \$'%- &'(\$'YffY]W VUf'i bX'V]YhYb'gW bY''Y
<]ZY"

F]W h][Yg'B chZU``j Yf\ U`hYb

⇒ a : U``Y'Y]bYg'B chZU``g'[]Vh'Yg'Ui h'XYf'GhUXh'DchgXUa 'Y]b][Y' K !
: fU[Yb ž'X]Y'VY]Y]bYa 'Bchfi ZVYUbhk cfhY'h'k YfXYb'gc``hYb"8 Uni
[Y\ØfYb'i bhYf'UbXYfYa 'X]Y': fU[Yb' K c']gh'Yg'dUgg]Yfh3 'i bX
K Ug']gh'dUgg]Yfh3 "'5i » YfXYa 'gc``hY'a Ub'X]Y'Y][YbY
HY'Y Zcbbi a a Yf'Xi fW [YVYb'i bX'X]Y'5bnU\`XYf'VYhfcZYbYb
DYfgcbYb'YbbYb"5a '9]bgUmcfh]gh'Yg'k]W h][ž'XYb
9]bgUm_fÀZhYb'XYb'K Y['ni a 'BchZU``cfh'ni 'nY][Ybž'i a 'Y]bY
gW bY''Y<]ZY'ni '[Yk À\`f'Y]ghYb"

8]Y'6Y\ØfXYb'fUHYb'Ui W'XUni ž'Ua ' ; YgWY\Ybgcfh'ni 'V'Y]VYb
i bX'gc'j]Y'Y'⇒ Zcfa Uh]cbYb'k]Y'a Ø[`]W'ni 'gUa a Y'b"8 Uni
[Y\ØfYb'b]W h'bi f'5b[UVYb'ni 'J Yf'YhnhYbž'gcbXYfb'Ui W
<]bk Y]gYž'X]Y'XYb'F Yhi b[g_fÀZhYb'\Y'ZYb'_ØbbYb"BUW'Y]bYa
BchZU``]gh'Yg'fUhgUa ž'Àfnh]WY'<]ZY'i bX'Yj Ybhi Y``
dgmW c'c[]gWY'i bhYfghØhni b['b'5bgdfi W'ni 'bY\ a Ybž'i a 'X]Y
; YgWY\ b]ggY'j YfUfVY]hYb'ni '_ØbbYb"

9fghY'<]ZY'i bX'K Y]hYfV]`Xi b[

9]b'k Y]hYfYf'k]W h][Yf'Di b_h]gh'X]Y'6YfY]hgW UZh'ni f'9fghYb'<]ZY"
@Ui h'Y]bYa '6Yf]W h'j cb': **YfbUfnh'**]gh'Y]b'YfghYg'<]ZY!NYfh]Z_Uh
i bVY[fYbnh[Ø'h][ž'YXcW'k]fX'[YfUHYbž'Ybbhb]ggY'U``Y'ZØbZ
⇒\fY'j]b'Y]bYa '5i Zf]gW i b[g_i fg'Ui Zni Zf]gWYb"8 Ug'[]Vh'XYb
6Øf[Yf.]bbYb'XUg'bch'k YbX][Y'K]ggYbž'i a 'b'BchZÀ``Yb'f]W h]['ni
\UbXYb"8 Yf'Y\Ya U][Y'8F?!DfÀg]XYb'h'8f"Fi Xc'Z'GY]hYfg'VYhcbhž
XUgg'Y]ba U][Y'?'i fgY'b]W h'Ui gfY]WYbž'i a 'ja '9fbghZU``g]WYf'ni
\UbXYb"

⇒ 8Yi hgW'UbX'ghYfVYb'ja 'GW b]h'hÀ[`]W'UW'h'A YbgWYb'ja
GhfU» Ybj Yf_Y\`fž'k Ug'X]Y'K]W h][_Y]hj cb'9fghYf'<]ZY'i a gc'a Y\`f

i bhYfghfY]W\h"6Y]XYb`J Yf_Y\fgi bZÄ`Yb`g]bX`Ä\`f`W\`HUi gYbXY
 J Yf`YmhY`ni`j YfnY]W\bYbžk Yg\U`V`X]Y`J cfVYfY]hi b[`Ui Z`gc`W\Y
 BchZÄ`Y`ZØf`YXYb`j cb`i bg`YggYbn]Y`]]gh`K]Y`X]Y`GhUXh`DchgXUa
 ni gUa a Yb`a]h`UbXYfYb`ϕZcfa Uh]cbgghY`Yb`Ui ZnY][hž`g]bX
 gW\bY`Y`i bX`f]W\h][Y`9fghY!<]ZY!A U» bU\ a Yb`Yb hgW\Y]XYbX`ZØf
 XYb`5i g[Ub[`j cb`l b[`ØW_Yb"

ϕ`XYf`gW\bY`Y`YV][Yb`NY]h`]gh`Yg`ZØf`X]Y`DchgXUa Yf.]bbYb
 i bYf`Ägg]W\žgck c\`X]Y`Bchfi Zbi a a Yfb`U`g`Ui W\`XUg`f]W\h][Y
 BchZU`j Yf\U`hYb`ni`_YbbYbž`i a`]a`9fbghZU`Y`ZZ]n]Ybh`\UbXY`b`ni
 _ÖbbYb`"8]Y`GhUXh`i bX`j\`fY`G]W\Yf\Y]hgVYUi ZhfU[hYb`ghY\Yb
 YXYfnY]h`VYfY]hž`i a`X]Y`6Øf[Yb`ØVYf`X]YgY`k]W\h][Yb`H\Ya Yb
 Ui Zni _`ÄfYb`i bX`ni`i bhYfghØhnYb"

8 YhU]`g	
C fh	< Ybb]b[!j cb!HfYgW_c k !GhfU» Y`- !% ž`%((* + DchgXUa ž`8 Yi hgW`UbX
E i Y`Yb	<ul style="list-style-type: none"> • k k k "a Un!cb`]bY"XY • k k k "dchgXUa "XY • k k k "ZYfbUfnh"Wĉa

6Ygi W\Yb`G]Y`i bg`Ui Z.`bU[!VfUbXYbVi f["XY