

?fmdhcZ]fa Yb']b'5`Ufa VYfY]hgW\UZh k À\fYbX'XYf'A Uf_hi bg]W\Yf\Y]h

7Y`g]i g`k Uf`Y]bYf`XYf`< Ui dhU_hYi fYž`XYf`X]Y`?fmdhck Y`h YfgWN ØhhYfhYžbUWN XYa 5V\YVib[YbžHUigWNjcf[Àb[YibX VYfk Y]qi b[Yb'nk]qWXYb'?cbhYb'i bhYfVfcWXYb'k i fXYb'8]Y 5bghYW_i b[XYg A Uf_hYg j YfUb`UgghY a Y\f 6OfgYb i bX 6Ub YbžBchZU``VYk Yfhi b[Yb'Ui Z'XYf'; fi bX`U[Y'XYq @lei]X]hÀhgghUhi g'XYf'I bhYfbY\a Yb'Xi fW\ni ZØ\fYb'A Y\fYfY ?fmdhck À\fi b[gVÒfgYb i bX ?fYX]hd`UhhZcfa Yb \UVYb]b XYb `YhnhYb'nk Y]'K cW\Yb'5V\YVi b[gghcddg'Ub[Y ØbX][hž'XU q]WX 'X]Y 'A Àf_hY 'Ui Z'XYf' [UbnYb 'K Y`h'a]h'6ÀfYbhYff]hcf]i a Ui gY]bUbXYfgYhnYb"'<]Yf']gh'Y]bY'NY]h`Y]ghYž'X]Y'X]Y'6ÒfgYb ibX?fYX]hd`UhhZcfa Ybiia fY]»hžX]YiibhYf'@]ei]X]hÀhqXfiW_ [YfUhYb]gbX"KcWXY]ca "%" ** b]8]Y?fmdhc!@YbX]b[!D`UhhZcfa '7Y`q]i q'k Uf'Y]bYf'XYf'<Ui dhU_hYi fYž'XYf'X]Y ?fmdhc!K Y`h'ni a 'YfghYb'A U`'YfgW\ØhhYfhYž'U`g'g]Y Ub_ØbX][hYž'5V\YVib[Ybž'HUigWXjcf[Àb[Y'ibX $VYfk Y]gi b[Yb nk]gWYb / Ua d \ Y^*]d /$

- 7Y`g]i g`k Uf`Y]bYf`XYf`< Ui dhU_hYi fYž`XYf`X]Y ?fmdhck Y`h YfgWX ØhhYfhYž'bUWXXYa `5V\YVi b[Ybž'HUi gWXj cf[Ab[Y i bX`, VYfk Y]gi b[Yb`nk]gWXYb`?cbhYb`i bhYfVfcWXYb k i fXYb
- 8]Y'5bghYW_i b['XYg'A Uf_hYg'j YfUb`UgghY'a Y\f'6ÒfgYb i bX'6Ub_Ybž'BchZU``VYk Yfhi b[Yb'Ui Z'XYf'; fi bX`U[Y'XYg @]ei]X]hÀhgghUhi g'XYf'l bhYfbY\a Yb'Xi fW\ni ZØ\fYb

A Y\fYfY'?fmdhck À\fi b[gVÒfgYb'i bX'?fYX]hd`UhhZcfa Yb'\UVYb']b XYb'`YhnhYb'nk Y]'K cW\Yb'5V\YVi b[gghcddg'Ub[Y_ØbX][hž'XU'g]W\X]Y'A Àf_hY'Ui Z'XYf'[UbnYb'K Y`h'a]h'6ÀfYbhYff]hcf]i a Ui gY]bUbXYfgYhnYb"'

 $<]Yf`]ghY]bY`NY]h`Y]ghYž`X]Y`X]Y`6 OfgYb`ibX`?fYX]hd`UhhZcfaYbiafY]» hž`X]Y`ibhYf`@]ei]X]hAhgXfiW_`[YfUhYb`g]bX"`$

K cWXY'jca '%' "'>i b]'

8]Y'?fmdhc!@YbX]b[!D`UhhZcfa '7Y`g]i g'k Uf'Y]bYf'XYf

<Ui dhU_hYi fYž'XYf'X]Y'?fmdhc!K Y`hini a 'YfghYb'A U`'YfgWXØhhYfhYž
U`g'g]Y'Ub_ØbX][hYž'5V\YVi b[Ybž'HUi gWXj cf[Àb[Y'i bX
, VYfk Y]gi b[Yb'nk]gWXYb'?cbhYb'Ui Z']\fYf'D`UhhZcfa 'Ui Z[fi bX
YI hfYa Yf'A Uf_hVYX]b[i b[Yb 'j cf'XYf'9fÒZZbi b['XYg
A cbhU[ga Uf_hYg'Ua '%' "'> b]'ni 'dUi g]YfYb"'

8 Ubb 'VY[Ubb 'g]W\ 'X]Y '5 bghY W_i b['XYg'A Uf_hYg'Ui gni VfY]hYb/'Uab \(\text{A} \text{W} \text{ghY b' A cf[Yb'? fmd hc V \(\text{O} \text{fgY '6]b Ub W}' \) i bhYfVfUW\ 'X]Y '6]hWc]b! \(5 \text{V} \text{V} i b[Yb 'Z\(\text{Z} \text{ff} \text{Y} hk U 'XfY] 'Ghi b XYb']ba]hhYb 'XYg'5 i ZdfU``g'j cb \(7 \text{Y} \text{g} i g" '9]b][Y'? fmd hc \(\text{U} \text{U} \text{V} \text{Y} b' \text{UVYb' Ui W 'XUfUb' [YUfVY]hY h\(\text{Z} \text{g}]\(\text{W} \text{Ui Z[fi b X 'XYf'? f]gY '\(\text{O} \text{ZZYbh'} \) W\ 'j cb '7 Y`g]i g'ni 'X]ghUbn]YfYb'''

5a 'A]hhk cWX'_Ua 'Yg'ni 'a Y\f'A Uf_hj c`Uh]`]hÀhž'bUWXXYa

5a '8cbbYfghU['[UV'X]Y']b'<cb[_cb['UbgAgg][Y'?fmdhc!GhU_]b[! i bX'9fhfU[g[YbYf]Yfi b[gd`UhhZcfa ':]bV`cl ž'X]Y' = bj Ygh]h]cbYb'j cb' 57'g]WXYfhYž'VY_Ubbhž'XUgg'g]Y'Ub[Yg]WXhg'XYf'I bg]WXYf\Y]h'j cb' 57'Y]b'a cbUh`]WXYg'5i gnU\`i b[g`]a]h'j cb'%") \$\$'`'Ui ZYf`Y[Yb i bX'X]Y'6Y`c\bi b[gj YfhY]`i b['Ui ggYhnYb'k]fX"'

8]YgY'FY]\Y'j cb'A U» bU\a Yb']gh'Y]b'bchk YbX][Yf'GW\f]hh']b Y]bYa 'gc'\cW\j c`Uh]`Yb'A Uf_h'i bX'k]f'[`Ui VYbž'XUgg'g]Y'i bg'i bX i bgYfYf'7ca a i b]hm'\Y`ZYb'gc``hYbž'X]Y'5i gk]f_i b[Yb'ni VYk À`h][Yb ž'gU[hY':]bV`cl']b'Y]bYf'9f_`Àfi b["'

?fmdhc!?fYX]h[YVYf'6UVY`:]bUbnYb'5i gnU\`i b[Yb'i bXFØW_bU\a Yb'Ua':fY]hU['i bhYf'6Yfi Zi b['Ui Z' i b[Yk Ò\b`]W\Yb@]ei]X]hÀhgXfi W_ 'Ui g[YgYhnh"8]Y'D`UhhZcfa 'U_hi U`]g]YfhY'UaZc`[YbXYb'AcbhU[ž'g]Y'\UVY' j cf`Ài Z][Y'JYfY]bVUfi b[Yb'ØVYf'X]YFØW_nU\`i b[gXUi Yf'Y]b][Yf'GW\i `XYb'[YhfcZZYb ži a']\fYb@]ei]X]hÀhgXfi W_'_i fnZf]gh]['ni 'j Yff]b[Yfb"

KcWXYjca *&\$" >i b]

8 Yf @ei]X]hàhgXfi W_'VfY]hYhY 'g]WX 'k Y]hYf 'Ui g" *\D XYf BUWX h'j cf XYf A Uf_hYf OZZbi b['Ua 'A cbhU['gU[hY 'X]Y ']b '< cb[_cb['Ubg Agg][Y ? fmd hc!6 OfgY '< cc']b 'U'6 `c[Y]b hf U['Yg 'k ØfXY '5i gnU\`i b[Yb 'i a &('V]g' + & 'Ghi b XYb 'j Yfn O[Yfbž'i b hYf 6 Yfi Zi b['Ui Z A Uf_hj c`Uh]`]hÀh'i b X '@ei]XUh]cbYb 'Xi fWX '[fc >> Y '\D gh]hi h]cbYb ']b XYf '? fmd hc]b Xi ghf]Y ž'k Ug 'VY] 'gY]b Yb '6 Ybi hn Yfb 'DUb]_ 'Ui g`OghYž XU'j]Y`Y 'b UWX '5i gnU\`i b[Yb '5i ggWX Ui '\]Y`hYb" '8 Yf '5i ghUi gWX 'K]XYffi Z'k]Y XYfYf OZZbYh 'Z@f Y]b][Y 'Hc_Yb 'UV 'A]hhk c WX "'

 $\pm b gY bY f Y hnhY b 5b ØbX][i b[ž'j YfÒZZY bh']W h'Ua : fY]hU[ž' < cc']$

gU[hY '9]b][Y 'gY]bYf DUfhbYf i bX 'Y]b][Y '\(\delta\)gh]hi h]cbYb 'k UfYb 'a]h
XYa 'DfcV 'Ya 'XYf 'VY[fYbnhYb '@]ei]X]hÀh '_cbZfcbh]Yfhž k Ug 'ni
XYa 'i b[Yk Ò\b`]W\Yb 'D\Abca Yb 'XYf 'F ØW_ZØ\fi b[g_UbA`Y 'XYf
8 YdchVUb_'j cb '<cc']b 'X]YgYb '\(\delta\)gh]hi h]cbYb 'ZØ\fhY"'</pre>

8 YfnY]h'_ca a i b]n]Yfh'i bX'`Ògh'<cc'U_h]j 'DfcV`Ya Y'a]h fY`Yj UbhYb'\dagh]hi h]cbYb'i bX'8f]hhYb ž'\Y]» h'Yg']b'XYf'9f_`Àfi b["'

I bhYfXYggYb [UV 'XYf'? fmd hc!6fc_Yf'J cmU[Yf'8][]hU``Ua 'A]hhk cW\
VY_Ubbhž'XUgg'Yf'VY]'' 57 'Yb[U[]Yfh'k Ufž'k c'XUg'I bhYfbY\a Yb
j Yfgi W\hYž'Yhk U'*) + 'A]``]cbYb'8c``Uf'ni fØW_ni Yf\U`hYbž'X]Y
Ub[YV`]W\'Ub'XYb'< YX[YZcbXg'[Y`]Y\Yb'k i fXYb"'

8 Yf']b'GmXbYm'UbgÀgg][Y'?fmdhc!?fYX]h[YVYf'A Ud`Y':]bUbWY'k Uf YVYbZU``g'a]h'@|ei]X]hÀhgXfi W_'_cbZfcbh]Yfh'i bX'gU[hY'Ua 8]YbghU[ž'XUgg'gY]bY'?fYX]h[YVYf'Ui Z'X]Y'FØW_nU\`i b[Yb'XYf ?fYX]hbY\a Yf'k UfhYb'a ØggYb"' 9g'_Ubb': À``Y'[YVYbž']b'XYbYb b]W\h'[YbØ[YbX'6Uf[Y`X']b'XYb'Dcc`g'j cf\UbXYb']gh ž'gc'XUg I bhYfbY\a Yb'gU[hY'"'

8]Y?fmdhc!6ÒfgY'7c]b:@9L'k Uf'Y]bY'XYf'Øb[ghYb':]fa Ybž'X]Y Y]bY'DUi gY'VY]'XYb'5V\YVi b[Yb'Ub_ØbX][hYž'hY]'hY'XUg I bhYfbY\a Yb'Ua'8cbbYfghU['a]h"'?i bXYb'_ÒbbYb'k Y]hYf\]b \UbXY`b'i bX'Y]bnU\`Ybž'UVYf'`Ui h'Y]bYf'9f_`Àfi b['_ÒbbYb'_Y]bY ; Y`XYf'j cb'XYf'D`UhhZcfa'[Ybca a Yb'k YfXYb"

5i Z'XYa 'K Y[']b'X]Y'`YhnhY' i b]k cW\Y'V`Y]Vh'Y]bY'[fc» Y
I bg]W\Yf\Y]hž'i bX'X]Y'A Uf_hhY]`bY\a Yf'[Y\Yb'a]h'6Ygcf[b]g
j cfUbž'XU'g]Y'dchYbn]Y``Y'GW\i \Y'bcW\'ZU``Yb'`UggYb'k YfXYb"

K Ybb Y]bYf'XYf'[fÒ» hYb ?fmdhc! < YX[YZcbXg'Ui Z[fi bX'j cb < YVY'k]f_i b['i bhYf'K UggYf'[YfUhYb'_Ubbž'a ØggYb'g]W\'X]Y A Uf_hhY]`bY\a Yf'XYf'[YgUa hYb' < YVY'k]f_i b['Ui Z'XYa 'A Uf_h VYk i ggh'gY]b'i bX'k]Y'g]Y']b'NY]hYb'VYY]bZi ggh'k]fXž']b'XYbYb X]YgYf'?fYX]h'd`Òhn`]W\'j YfgW\k]bXYh ž'A UXg'9VYf\UfXhž 7fmdhcW'ffYbWh'5bU`mgh'VY]'gU[hY'X]Y'GUI c'6Ub_'[Y[YbØVYf6`cW_k cf_g"

 $OH\ UhQ\ Uh'X]Y'A\ UWX\ hž'j\]Y`Y'?\ fmd\ hc!?\ fYX]h[\ YVYf']b'X]Y'?\ b]Y'ni$ $nk\]b[\ Yb'i\ bX'X]Y'5bghYW_i\ b[\ 'YZZY_h]j'k\ Y]hYf'Ubni\ Y]nYb\ \check{z}'Z\emptyset[\ hYYf']bni\ "$

n • n

8 Y f '6 Y] h f u ['7 f m d h c ':] f a g 'C b '5 `Y f h ' K \] `Y 'A U f _Y h ' I b W f h U] b h m '] g h _ Y] b Y 'Z] b U b n] Y ``Y '6 Y f U h i b ["

8 Y hU1`c

6Ygi WXYb G]Y i bg Ui Z _fmdhc!bYk g"Uh