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4P!

!#%K9(52)3!;(MR2A+6!R(A5(R;.2),!;(MR2A+6!.);(A<+6!3.95A.M.)+;.2),!52)5(R;%+6!A(RA(9();+;.2),!

- 4S! R(A5(R;%+6!6(+A).)/,!32%K6(!;A+.).)/!
- 4Y!
- 4\_! 7, ()"2#1(+", '

r.

e55%A+;(!;.M.)/!.9!5A%5.+6!.)!R(A5(.<.)/!

P<sup>1</sup>; \$+; !M23+6; : &9R(5.7.5!R(A5(R;%+6!6(+A).)/!27!; (MR2A+6!.); (A<+6!3.95A.M.)+;.2)!5+)!+5;%+66: !;A+)97(A!

Pa! 52MR6(;(6: !+5A299!M23+6;.(9!W.;\$!+!32%K6(!;A+.).)/!RA25(3%A(![1.2)/,!\*%+),!f!-%,!4b44^,!RA2<.3.)/!

Sb! 7%A; \$ (A! (<.3()5(!72A!M23+6.;: &%)9R(5.7.5!; (MR2A+6!RA25(99.)/X!

S"! L (!\$: R2;\$(9.d(!;\$+;!;\$(A(!(\.9;9!+!/()(A+6,!+K9;A+5;,!+)3!52)5(R;%+6!A(RA(9();+;.2)!27!

S4! 9%K9(52)3!;.M(!.)!;\$(!KA+.)X!U\$.9!\$:R2;\$(9.9!\$+9!K(())!.)9R.A(3!K:!2%A!/()(A+6!RA2R29+6!;\$+;!R(A5(R;%+6!

SE! 6(+A).)/!.9!;\$(!6(+A).)/!27!9()92A:!52)5(R;9,!92!;\$+;!6(+A).)/!5+)!;A+)97(A!K(;W(()!9;.M%.!W.;\$!3.9;.)5;!

SP! R\$: 9.5+6!+RR(+A+)5(9!+)3!RA(5.9.2)9![;\$A(9\$2639^,!+)3!K(;W(()!9()92A: !M23+6.;.(9![L+)/!(;!+6\,!4b"YH!

SS! 1.(!f!-%,!4b"aH!1.2)/,!U+)/,!0\$+)/,!f!-%,!4b4bH!Q%,!L(),!'\$(),!f!-%,!4b4"^X!e!52)5(R;%+6!

SY! A(RA(9();+;.2)!27!9%K9(52)3!;.M(!.9!52)9.9;();!W.;\$!M23+6.;:&%)9R(5.7.5!;(MR2A+6!RA25(99.)/![#;+%77(A!

S\_! (;!+6%,!4b"4H!c.6.RR2R2%629!(;!+6%,!4b"EH!B+A)(!(;!+6%,!4b"`H!BA+;dD(!f!F6A.5\$,!4b"aH!1.2)/!(;!+6%,!4b44^%!

S`! Q2W(<(A,!.;!7+5(9!+!9(A.2%9!5\$+66()/(!+9!RA(<.2%9!9;%3.(9!\$+<(!52)9.9;();6:!A(R2A;(3!)2!;A+)97(A!27!U=>!

Sa! 6(+A).)/!7A2M!;A+.)(3!;2!%);A+.)(3!;(MR2A+6!.);(A<+69X!LA./\$;,!B%2)2M+)2,!@+\$)5D(,!+)3!@(Ad().5\$!

Yb! ["aa\_'!7.A9; !A(R2A; (3!.); (A<+6!9R(5.7.5.;:!.)!U=>!R(A5(R; %+6!6(+A).)/,!7.)3.)/!; +;!6(+A).)/!+!"bb&M9!

Y"! .);(A<+6!K(;W(()!;W2!92%)39!3.3!)2;!;A+)97(A!;2!+!Sb&M9!2A!4bb&M9!.);(A<+6X!U\$.9!2K9(A<+;.2)!\$+9!K(()!

Y4! A(R6.5+; (3!.)!<+A.2%9!9;%3.(9!2)!9()92A:!+)3!M2;2A!U=>!6(+A).)/![g+/+A+6+),!B6+D(,!LA./\$;,!B:6,!f!

@(Ad().5\$,!"aa`H!@((/+),!e%.),!f!0+52K9,!4bbbH!h+AM+AD+A!f!B%2)2M+)2,!4bbEH!LA./\$;,!L.692),!f!

- \_4! 625+;.2)!2A!2A.();+;.2)![1.+2!(;!+6\,!4bb`H!0\$+)/!(;!+6\,!4b"b^X!=)!;\$(!5%AA();!52);(\;,!.:!52MRA.9(3!;W2!
- \_E! 3.9;.)5;!52MR2)();92!U\$(!RA.M+A:!;A+.).)/!725%9(3!2)!+%3.;2A:!U=>!;A+.).)/!+;!+!9R(5.7.5!;.M(!.);(A<+6,!
- \_P! +) 3!;\$(!9(52) 3+A: !;A+.).)/!W+9!+!;2)(!c>!;+9D!+;!+)!%);A+.)(3!;A+)97(A!.);(A<+64!U\$A2%/\$!52);A26!
- \_S! (\R(A.M();9,!W(!RA2<(3!;\$+;!;\$.9!9(52)3+A:!;+9D!W+9!7%)5;.2)+6:!.)3(R()3();!27!;\$(!RA.M+A:!;+9D!+)3!
- \_Y! 3.3!)2;!9./).7.5+);6: !+77(5;!U=>!R(A72AM+)5(!2)!.;9!2W)X!i %A!\$: R2;\$(9.9!W+9!;\$+;!.7!U=>!6(+A).)/!.MRA2<(9! +)!+K9;A+5;!+)3!52)5(R;%+6!A(RA(9();+;.2)!27!9%K9(52)3!;.M.)/,!;\$(!9(52)3+A:!;+9D!

- aY! A(V%(9;,!W(!W.66!RA2<.3(!+55(99!;2!+66!3+;+,!+)+6:9.9!523(,!+)3!A(9(+A5\$!M+;(A.+69X!>+;+!+)+6:9.9!W+9!
- a\_! 52) 3%5; (3!%9.) / !; \$ (!C!927; W+A (![Co' 2A (oU (+M,!4b'' S^X!U\$ (!3 (9./)!+) 3!+) +6: 9.9!27!; \$.9!9; %3: !W (A (!) 2;!
- a`! RA(&A(/.9;(A(3X!
- aa! =\*34%&'=+>&''
- "bb! U\$ (!3(5.9.2)!72A!2%A!9+MR6(!9.d(!W+9!K+9(3!2)!+!RA(<.2%9!U=>!6(+A).)/!9;%3: !K: !LA./\$;!(;!+6X!
- "b"! ["aa\_^!;\$+;!%;.6.d(3!9.M.6+A!9;.M%6.![;\$(.A!c./%A(!P,!"bb!M9!I!"!DQd!52)3.;.2)^X!c2A!R2W(A!+)+6:9.9,!W(!%9(3!
- "b4! ;\$(!\*T82W(A!927;W+A(X!=)!2%A!9;%3:,!;\$(!M(+9%A(9!27!6(+A).)/!+)3!;A+)97(A!7.A9;!.)<26<(3!52MR+A.)/!RA(&!
- "bE! +)3!R29;&;A+.).)/!;\$A(9\$2639!.)!+66!(\R(A.M();9X!U\$(!9+MR6(!9.d(!72A!(+5\$!/A2%R!W+9!;\$%9!3(;(AM.)(3!
- "bP! %9.)/!;\$(!;!;(9;9!7+M.6: !72A!;\$(!3.77(A()5(!K(;W(()!;W2!3(R()3();!M(+9%A(9![M+;5\$(3!R+.A9^X!U2!+5\$.(<(! bp!R2W(A!+;!+!9./).7.5+)5(!6(<(6!27! !q!XbS,!+)3!+)!(77(5;!9.d(!27!' 2\$()n9! !q!"XEP!.)!

- "4b! 7.A9;!9;.M%%9!+)3!;\$(!2)9(;!27!;\$(!9(52)3!9;.M%%9X!U\$(!U=>!;\$A(9\$2639!W(A(!+99(99(3!%9.)/!;\$(!M(;\$23!
- "4"! 27!52)9;+);!9;.M%6X!=)!(+5\$!72A5(3&5\$2.5(!;A.+6,!+!<.9%+6!7.\+;.2)!R2.);!+RR(+A(3!+;!;\$(!5();(A!27!;\$(!
- "44! 52MR%; (A!95A(()!72A!Ebb!M9X!U\$(),!;W2!R+.A9!27!9; .M%.!W(A(!RA(9();(3!.)!A+)32M!2A3(A,!W.;\$!2)(!R+.A!
- "4E! 52);+.).)/!+!9;+)3+A3!.);(A<+6![#=^!+)3!;\$(!2;\$(A!R+.A!52);+.).)/!+!52MR+A.92)!.);(A<+6![#=!r!s=^X!U\$(A(!
- "4P! W+9!+!abb&M9!.);(A&.);(A<+6!;.M(!/+R!K(;W(()!;\$(!RA(9();+;.2)!27!;\$(9(!;W2!R+.A9![9((!c./%A(!"e!72A!
- "4S! 3(;+.69<sup>^</sup>X!U\$(!9;+)3+A3!.);(A<+6!<+A.(3!+;!"bb!M9,!4bb!M9,!2A!Pbb!M9!3(R()3.)/!2)!;\$(!(\R(A.M();+6!

- "PP! 52MR+A.92)!.);(A<+6!K(.)/!62)/(A!+;!(+5\$!s=,!D!A(RA(9();(3!;\$(!962R(,!+)3!s=!A(RA(9();(3!;\$(!R2.);!27!
- "PS! 9%K6(5;.<(!(V%.<+6()5(X!e!A22;!M(+)!9V%+A(!(AA2A![C@#N^!<+6%(!W+9!5+65%+;(3!72A!(+5\$!7.;;(3!
- "PY! R9: 5\$2M(;A.5!7%)5;.2)!+9!+)!.)3.5+;2A!27!/223)(99!27!7.;X!e5A299!+66!9(99.2)9,!;\$(!C@#N9!A+)/(3!7A2M!bXb"!
- "P\_! ;2!bX"",!.)3.5+;.)/!9+;.97+5;2A:!3+;+!7.;;.)/X!U\$(!U=>!;\$A(9\$263!W+9!3(7.)(3!+9!\$+67!;\$(!.);(AV%+A;.6(!A+)/(!
- "P`! 27!;\$(!7%)5;.2)Z!U\$A(9\$263!q![s= &!s= ^?4X!U\$.9!;\$A(9\$263!A(RA(9());(3!;\$(!s=!+;!W\$.5\$!R+A;.5.R+);9!
- "Pa! R(A5(.<(3!; \$(!52MR+A.92)!.); (A<+6!+9!9\$2A; (A!; \$+)!; \$(!9;+)3+A3!.); (A<+6!.)!Sbp!27!; \$(!;A+69,!+)3!62)/(A!)
- "Sb! ;\$+)!;\$(!9;+)3+A3!.);(A<+6!.)!;\$(!A(M+.).)/!Sbp!27!;A.+69X!=)3.<.3%+6!RA(&;A+.).)/!+)3!R29;&;A+.).)/!
- "S"! R9: 5\$2M(;A.5!7%)5;.2)9!W(A(!RA2<.3(3!.)!c./%A(9!#"!&#Y!.)!;\$(!#%RR6(M();+A:!@+;(A.+69X!
- "S4!

## =)!;\$(!c>!;+9D,!;\$(!9;.M%.!W(A(!.3());.5+6!;2!;\$29(!%9(3!72A!;\$(!U=>!;+9D))

;A+)97(A!(77(5;9!+;!K2;\$!"bb**and)9378(ATQ**1Tf-0.0031Tc11.040011.04197.2BT08768.44Tm[(M9)11.04154.24754709.44Tm0011.0472

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+6; (A) +; <<(!\$: R2;\$(9.9![Q"^!2<(A!;\$(!)%66!

44E!

44P!	[e^!U\$(!RA25(3%A(!27!+!;(MR2A+6!.);(A<+6!3.95A.M.)+;.2)![U=>^!;A.+6X!U\$(!9;+)3+A3!.);(A<+6!R+.A!
------	--

- 44S! .)56%3(3!;W2!"S&M9!;2)(!R.R9!["!DQd^!9(R+A+;(3!K:!+!9;+)3+A3!.);(A<+6![#=^,!W\$(A(+9!;\$(!52MR+A.92)!
- 44Y! .); (A<+6!R+.A!.)56%3(3!;\$(!9+M(!;W2&;2)(!R.R9!9(R+A+;(3!K:!+)!#=!r!!=!.); (A<+6!!=)!(+5\$!;A.+6!;\$(!9;+)3+A3!
- 44\_! +)3!52MR+A.92)!R+.A9!W(A(!RA(9();(3!.)!+!A+)32M!2A3(A!W.;\$!+!abb&M9!;.M(!/+RX!8+A;.5.R+);9!\$+3!;2!
- 44`! 3(;(AM.)(!W\$.5\$!R+.A!\$+3!+!62)/(A!.);(A<+6X!c2A!c>!;A.+69!2)6:!52)3%5;(3!.)!N\R(A.M();9!4!+)3!E,!;\$(!
- 44a! RA25(3%A(!W+9!)(+A6:!;(!9+M(X!Q2W(<(A,!K2;\$!R+.A9!\$+3!+)!);(A<+6!.3();.5+6!;2!;\$(!;A+)97(A!.);(A<+6!.3));(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A<+6!.3);(A=+6!.3);(A=+
  - [(X/X,!4bb!M9!.)!N\R(A.M();!4!+)3!Pbb!M9!.)!N\R(A.M();!E^,!W.;\$!2)(!R+.A!\$+<.)/!;2)(!R.R9!+;!+!9;+)3+A3!

- 4P\_! 9\$2W(3!9./).7.5+);!M+.)!(77(5;9!27!=);(A<+6![ [4,!"`^!q!E4XYE,! !u!Xbb"^!+)3!U(9;![ [",!EY^!q!4aXYS,! !u!
- 4P`! Xbb"^,!K%;!)2!9./).7.5+);!M+.)!(77(5;!27!\*A2%R![ [S,!E`^!q!"X"`,! !q!bXEP^X!e33.;.2)+6:,!;\$(A(!W(A(!
- 4Pa! 9./).7.5+);!.);(A+5;.2)9!K(;W(()!=);(A<+6!+)3!U(9;![ [4,IEb^!q!`XYa,! !q!Xbb"^,!+9!W(60!+9!+M2)/!\*A2%R,!

=);(A<+6,!+)3!U(9;![ [E,!Eb^!q!EXaP,! !q!Xb''\_X!U\$(9(!.);(A+5;.2)9!.)3.5+;(3!;\$+;!;\$(!

- 4\_b! 7A2M!;\$(!4bb&M9!U=>!;+9D!R+A;.+66:!;A+)97(AA(3!;2!;\$(!"bb&M9!.);(A<+6,!W\$.5\$!W+9!+RRA2\.M+;(6:!Pbp!27!
- 4\_"!;\$(!3.A(5;!;A+.).)/!(77(5;!2K9(A<(3!W.;\$!;\$(!"bb&M9!U=>!;+9D![A(3!5.A56(9!.)!c./%A(!4B^X!
- 4\_4! @+-#)&'H'
- 4\_E!

4\_P!\$ 0 11.04 54 3 (\$ 0 103Tc 11389 03Tc 112 Tm [(A-()-1 (".)-2 (5)-2 ))-1 (/)-1 (0)-1 (807 .002 Tc?12 Tm [(%13")1 (12

- 4`P! CD4&)+3&, ('HE': 7! '%\*), +, -'()\*, /F&)'F)'' 3'\*'AII03/'()\*+, &2'+, (&). \*%('''\*'HII03/'+, (&). \*%G+(5'2''#\$%&'
- 4`S! ()\*+,+,-'
- 4`Y! '2)9.9; (); !W.; \$!2%A!\$: R2; \$ (9.9, !W (!72%) 3!+!9./).7.5+); !; A+)97 (A! (77 (5; !7A2M!"bb&M9!; 2!4bb&M9!
- 4<sup>1</sup>, +7; (A!32%K6(!;A+.).)/X!>2%K6(!;A+.).)/!A(9%; (3!.)!+!9./).7.5+); !A(3%5;.2)!.)!"bb&M9!U=>!; \$A(9\$2639!K:!bX4\_!

j!bXbY!62/!%).;9![!q!&PXEb,! !



KA2W) !5.A56(9<sup>^</sup>X!U\$(!(<+6%+;.2)!27!;\$(!4bb&M9!U=>!;+9D!W+9!52)3%5;(3!3%A.)/!;\$(!.).;.+6!+)3!7.)+6!32%K6§!51512" j ETQBT000

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- EPY! bXEY![: (%2W!5.A56(9!.)!c./%A(!PB,!' ^X!U\$.9!.MR6.(9!;\$+;!;\$(!.MRA2<(M();!2K9(A<(3!.)!;\$(!Pbb&M9!U=>!
- $EP_! MRA2 < (M(); !W+9!.) 3((3!3\%(!; 2!32\%K6(!; A+.).)/!+) 3!W+9!) 2; !; $(!A(9\%; !27!; $(!Pbb&M9!c>!; A+.).)/!+62) (X!) = (X + 1) + ($
- EP`! U\$(!RA(&;A+.).)/!Pbb&M9!U=>!;\$A(9\$263![:(662W!5.A56(!27!#(99.2)!''!.)!c./%A(!PB^!72A!;\$(!52);A26!/A2%R!
- EPa! +RR(+A(3!;2!K(!62W(A!;\$+)!;\$+;!27!;\$(!32%K6(!;A+.).)/!/A2%R![: (62W!5.A56(!27!#(99.2)!"!.)!c./%A(!PB^%!U\$.9!
- ESb! 3.77(A()5(!W+9!M+.)6:!+;;A.K%;+K6(!;2!2)(!R+A;.5.R+);!W\$2!\$+3!+)!(\5(R;.2)+66:!62W!RA(&;A+.).)/!
- ES"! ;\$A(9\$263!+;!PX"pX!FR2)!(\56%3.)/!;\$.9!R+A;.5.R+);n9!3+;+!7A2M!;\$(!+)+6:9.9,!;\$(!9;+;.9;.5+6!52)56%9.2)9!
- ES4! A(M+.) (3!52)9.9; ();X!
- ESE!
- ESP! @+-#)&'K'

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## EY"! [#(99.2)9!`&"b,!5%A<(!W.;\$!: (%2W!5.A56(9^X![B^!U\$(!.MR+5;!27!Pbb&M9!c>!;A+.).)/![5%A<(!W.;\$!KA2W)!

5.A56(9^!+62)(!2)!Pbb&

- $E^{S!} = \#R(5.7.5.;.(9!.)!R(A5(R;\%+6!6(+A).)/!\$+<(!K(()!\%9(3!;2!.)7(A!;\$(!)(\%A+6!M(5\$+).9M9!\%)3(A6:.)/!)))$
- $E^{Y!} = 6(+A).)/![#+/.,!4b'''H!L+;+)+K(!f!#+9+D.,!4b''S'X!=)!;.M(!R(A5(R;.2),!;$(!.);(A<+6!+)3!M23+6.;:!))$
- E`\_! 9R(5.7.5.;.(9!.)!U=>!6(+A).)/!W(A(!+692!.);(ARA(;(3!+9!(<.3()5(!+/+.)9;!+!5();A+6.d(3!5625D!+)3!72A!
- E``! 3.9;A.K%; (3!M(5\$+).9M9![B%(;.!f!B%2)2M+)2,!4b"P^X!Q2W(<(A,!32%K6(!;A+.).)/!A(9%;9!9%//(9;!;\$+;!9%5\$!
- E`a! 9R(5.7.5.;.(9!6.D(6: !+A.9(!7A2M!R+A;.5%+A!9.)/6(&;A+.).)/!RA25(3%A(9,!A+;\$(A!;\$+)!K(.)/!.)\$(A();!RA2R(A;.(9!
- Eab! 27!; (MR2A+666(+A).)/XII) (!R299.K6(!5+%9(!72A!6(+A).)/!9R(5.7.5.;: !M./\$; !K(!<+A.2%9!3(/A((9!27!2<(A7.;;.)/!
- Ea"! 3%A.)/!;A+.).)/![@2662)!f!>+).62<+,!"aaY!!#+/.,!4b""^X!e552A3.)/!;2!;\$.9!+552%);,!;\$(!R+A;.5.R+);9!3%A.)/!
- Ea4! ;A+.).)/!M+: !6(+A)!;2!+;;()3!;2!<+A.2%9!R(5%.+A.;.(9!;\$+;!+A(!+9925.+;(3!W.;\$!;\$(!;A+.).)/!52)3.;.2)!K%;!
- $\mathsf{EaE!} + \mathsf{A}(!) 2; !) (5(99 + \mathsf{A.6}: !\mathsf{A}(6(<+); !; 2!; \$(!; \mathsf{A}+.) (3!; +9\mathsf{D}X!\mathsf{B}(5+\%9(!27!2<(\mathsf{A7}.;;.)/,!6(+\mathsf{A}).)/!5+)) 2; !; \mathsf{A}+) 97(\mathsf{A}!; 2!) (\mathsf{W}!) + \mathsf{A}(!) 2; !) (\mathsf{A}(!) 2; !)$

## 52)3.32;)\$4()(\$)(AETT\$ETT9+TVTT(OR1(576/77AT;O(9)M+(++)2;(2))19;X1+,M+6+AETVE(TRA2R00(0;38+;Te911.04 0 0 11.0 72 467.76 Tm [(52)

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- PEE! "bb&M9!;2!4bb&M9X!c%A;\$(AM2A(,!;\$(!.MRA2<(M());!27!;\$.9!;(MR2A+6!R(A5(R;.2)!.9!6.D(6:!;+9D&9R(5.7.5,!+9!
- PEP! W(!3.3!)2;!2K9(A<(!+)!.MRA2<(M();!27!U=>!;+9D!+7;(A!c>!;A+.).)/![c./%A(9!EB,!PB^,!W\$.5\$!(\56%3(9!;\$(!
- PES! R299.K.6.;:!;\$+;!U=>!6(+A).)/!;A+)97(A!.9!5+%9(3!K:!;A+.).)/&.MRA2<(3!/()(A+6!3(5.9.2)&M+D.)/!5+R+K.6.;:,!
- PEY! +9!W(66!+9!/()(A+6!+%3.;2A:!+;;();.2)![K2;\$!+A(!+%3.;2A:!;+9D9^X!=)9;(+3,!;\$(!5A299&.);(A<+6!6(+A).)/!
- ;A+)97(A!9%//(9;9!;\$+;!;A+.).)/!()\$+)5(9!92M(!7%)3+M();+6!D)2W6(3/(!27!;(MR2A+6!.);(A<+6!.)72AM+;.2)X!

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3.95A.M.)+;.2)!;+9DX!

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- S\_Y! 1.2)/,!-X!0X,!U+)/,!>X!1X,!0\$+)/,!-X!1X,!f!-%,!'X![4b4b^X!'2MR6(;(!5A299&7A(V%()5:!;A+)97(A!27!;2)(!7A(V%()5:! S\_! 6(+A).)/!+7;(A!32%K6(!;A+.).)/X! ,!AP&"bEX!!
- $$\begin{split} & S_{1,2} / , I = X_{1} O X_{1} O X_{1} O X_{2} O X_{1} O$$
- $S^{4!} = 0 + \frac{1}{100} + \frac{$
- S`P!

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- S`S! !
- S`Y!!