

# THE PERIODIC TABLE

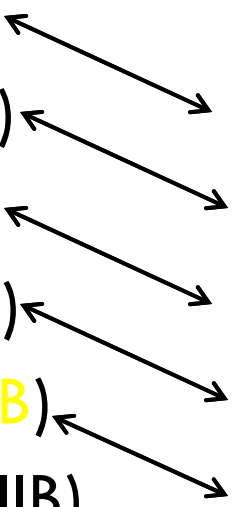
Working out the issues

# What's with the Group #'s

- Different periodic tables have different labels for the group numbers.
  - Group 1 (IA, IA)
  - Group 2 (IIA, IIA)
  - Group 3 (IIIA, IIIB)
  - Group 4 (IVA, IVB)
  - Group 5 (VA, VB)
  - Group 6 (VIA, VIB)
  - Group 7 (VIIA, VIIB)
  - Group 8 (VIIIA, VIIIB)
  - Group 9 (VIIIA, VIIIB)
  - Group 10 (VIIIA, VIIB)
  - Group 11 (IB, IB)
  - Group 12 (IIB, IIB)
  - Group 13 (IIIB, IIIA)
  - Group 14 (IVB, IVA)
  - Group 15 (VB, VA)
  - Group 16 (VIB, VIA)
  - Group 17 (VIIB, VIIA)
  - Group 18 (VIII, VIIIA)

# What's with the Group #'s

□ Different periodic tables have different labels for the group numbers.

- Group 1 (IA, IA)
  - Group 2 (IIA, IIA)
  - Group 3 (IIIA, **IIIB**)
  - Group 4 (IVA, **IVB**)
  - Group 5 (VA, **VB**)
  - Group 6 (VIA, **VIB**)
  - Group 7 (VIIA, **VIIIB**)
  - Group 8 (VIIIA, VIIIB)
  - Group 9 (VIIIA, VIIIB)
  - Group 10 (VIIIA, VIIIB)
  - Group 11 (IB, IB)
  - Group 12 (IIB, IIB)
  - Group 13 (**IIIB**, IIIA)
  - Group 14 (**IVB**, IVA)
  - Group 15 (**VB**, VA)
  - Group 16 (**VIB**, VIA)
  - Group 17 (**VIIIB**, VIIA)
  - Group 18 (VIII, VIIIA)
- 

# In America...

IA																	VIIIA					
1 H	IIA											5 B	6 C	7 N	8 O	9 F	10 Ne					
3 Li	4 Be											VIII B					13 Al	14 Si	15 P	16 S	17 Cl	18 Ar
11 Na	12 Mg	III B	IV B	V B	VII B	VIII B				IB	IIB	31 Ga	32 Ge	33 As	34 Se	35 Br	36 Kr					
19 K	20 Ca	21 Sc	22 Ti	23 V	24 Cr	25 Mn	26 Fe	27 Co	28 Ni	29 Cu	30 Zn	31 Ga	32 Ge	33 As	34 Se	35 Br	36 Kr					
37 Rb	38 Sr	39 Y	40 Zr	41 Nb	42 Mo	43 Tc	44 Ru	45 Rh	46 Pd	47 Ag	48 Cd	49 In	50 Sn	51 Sb	52 Te	53 I	54 Xe					
55 Cs	56 Ba	57 La	72 Hf	73 Ta	74 W	75 Re	76 Os	77 Ir	78 Pt	79 Au	80 Hg	81 Tl	82 Pb	83 Bi	84 Po	85 At	86 Rn					
87 Fr	88 Ra	89 Ac	104 Unq	105 Unp	106 Unh	107 Uns	108 Uno	109 Une	110 Unn													

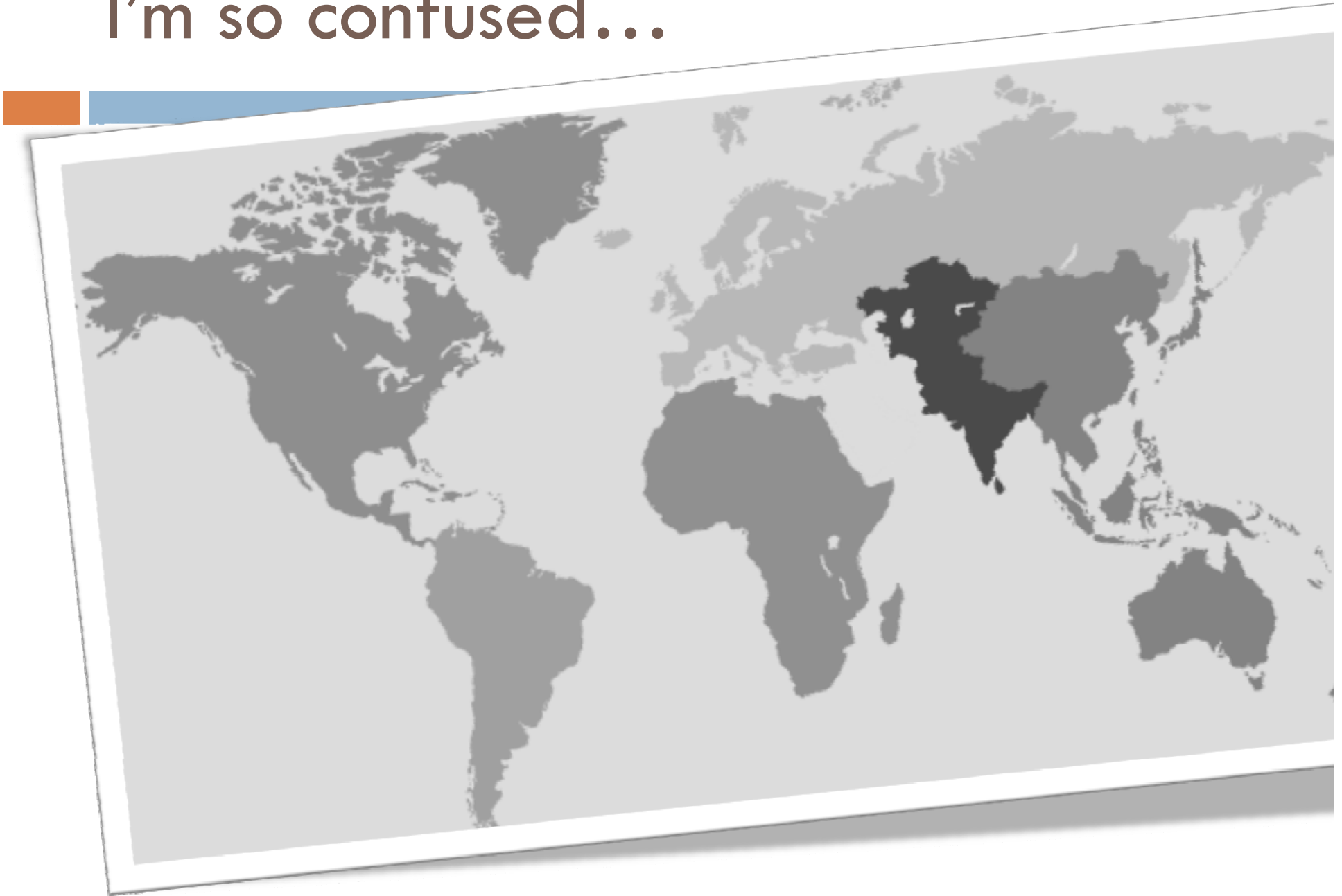
58 Ce	59 Pr	60 Nd	61 Pm	62 Sm	63 Eu	64 Gd	65 Tb	66 Dy	67 Ho	68 Er	69 Tm	70 Yb	71 Lu
90 Th	91 Pa	92 U	93 Np	94 Pu	95 Am	96 Cm	97 Bk	98 Cf	99 Es	100 Fm	101 Md	102 No	103 Lr

# In Europe...


IA												VIII						
1 H	IIA												5 B	6 C	7 N	8 O	9 F	10 Ne
3 Li	4 Be	VIII A										13 Al	14 Si	15 P	16 S	17 Cl	18 Ar	
11 Na	12 Mg	III A	IVA	VA	VIA	VII A	IB			IIB	31 Ga	32 Ge	33 As	34 Se	35 Br	36 Kr		
19 K	20 Ca	21 Sc	22 Ti	23 V	24 Cr	25 Mn	26 Fe	27 Co	28 Ni	29 Cu	30 Zn	31 Ga	32 Ge	33 As	34 Se	35 Br	36 Kr	
37 Rb	38 Sr	39 Y	40 Zr	41 Nb	42 Mo	43 Tc	44 Ru	45 Rh	46 Pd	47 Ag	48 Cd	49 In	50 Sn	51 Sb	52 Te	53 I	54 Xe	
55 Cs	56 Ba	57 La	72 Hf	73 Ta	74 W	75 Re	76 Os	77 Ir	78 Pt	79 Au	80 Hg	81 Tl	82 Pb	83 Bi	84 Po	85 At	86 Rn	
87 Fr	88 Ra	89 Ac	104 Unq	105 Unp	106 Unh	107 Uns	108 Uno	109 Une	110 Unn									

58 Ce	59 Pr	60 Nd	61 Pm	62 Sm	63 Eu	64 Gd	65 Tb	66 Dy	67 Ho	68 Er	69 Tm	70 Yb	71 Lu
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I'm so confused...

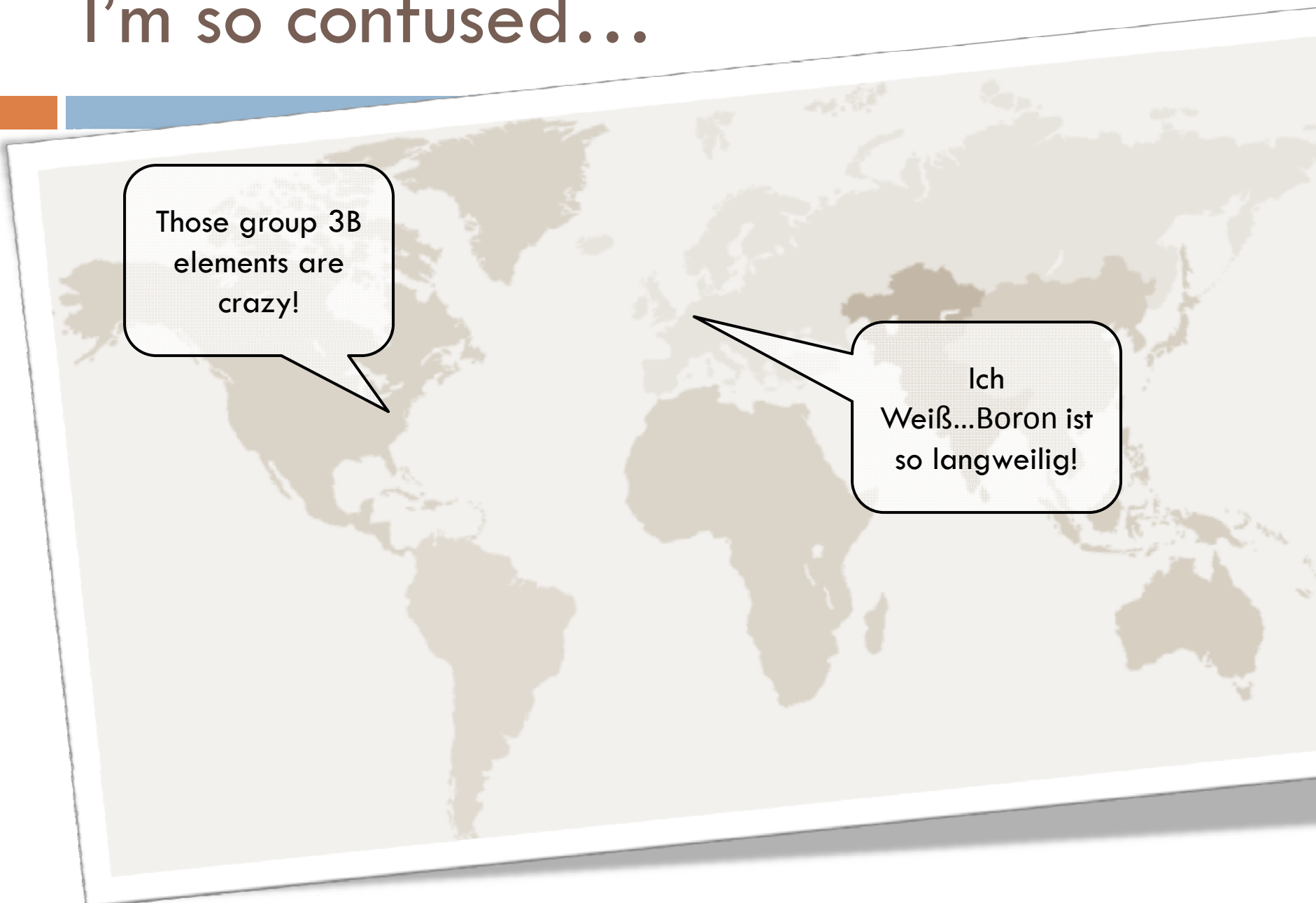


# I'm so confused...

A world map is shown in a light beige color, tilted slightly to the right. A speech bubble with a black border and a tail pointing towards North America is overlaid on the map. The text inside the speech bubble reads: "Those group 3B elements are crazy!".

Those group 3B  
elements are  
crazy!

# I'm so confused...

A world map is shown in a light beige tone, tilted slightly. Two speech bubbles are overlaid on the map. The first speech bubble is positioned over North America and contains the text 'Those group 3B elements are crazy!'. The second speech bubble is positioned over Europe and contains the text 'Ich Weiß...Boron ist so langweilig!'.

Those group 3B  
elements are  
crazy!

Ich  
Weiß...Boron ist  
so langweilig!



# I'm so confused...



Huh?!?

Ich  
Weiß...Boron ist  
so langweilig!

# The Solution

1																	18																																																								
H <sup>1</sup>												B <sup>5</sup>	C <sup>6</sup>	N <sup>7</sup>	O <sup>8</sup>	F <sup>9</sup>	He <sup>2</sup>																																																								
Li <sup>3</sup>	Be <sup>4</sup>											Al <sup>13</sup>	Si <sup>14</sup>	P <sup>15</sup>	S <sup>16</sup>	Cl <sup>17</sup>	Ar <sup>18</sup>																																																								
Na <sup>11</sup>	Mg <sup>12</sup>	3	4	5	6	7	8	9	10	11	12	Ga <sup>31</sup>	Ge <sup>32</sup>	As <sup>33</sup>	Se <sup>34</sup>	Br <sup>35</sup>	Kr <sup>36</sup>																																																								
K <sup>19</sup>	Ca <sup>20</sup>	Sc <sup>21</sup>	Ti <sup>22</sup>	V <sup>23</sup>	Cr <sup>24</sup>	Mn <sup>25</sup>	Fe <sup>26</sup>	Co <sup>27</sup>	Ni <sup>28</sup>	Cu <sup>29</sup>	Zn <sup>30</sup>	In <sup>49</sup>	Sn <sup>50</sup>	Sb <sup>51</sup>	Te <sup>52</sup>	I <sup>53</sup>	Xe <sup>54</sup>																																																								
Rb <sup>37</sup>	Sr <sup>38</sup>	Y <sup>39</sup>	Zr <sup>40</sup>	Nb <sup>41</sup>	Mo <sup>42</sup>	Tc <sup>43</sup>	Ru <sup>44</sup>	Rh <sup>45</sup>	Pd <sup>46</sup>	Ag <sup>47</sup>	Cd <sup>48</sup>	Tl <sup>81</sup>	Pb <sup>82</sup>	Bi <sup>83</sup>	Po <sup>84</sup>	At <sup>85</sup>	Rn <sup>86</sup>																																																								
Cs <sup>55</sup>	Ba <sup>56</sup>	La <sup>57</sup>	Hf <sup>72</sup>	Ta <sup>73</sup>	W <sup>74</sup>	Re <sup>75</sup>	Os <sup>76</sup>	Ir <sup>77</sup>	Pt <sup>78</sup>	Au <sup>79</sup>	Hg <sup>80</sup>																																																														
Fr <sup>87</sup>	Ra <sup>88</sup>	Ac <sup>89</sup>	Unq <sup>104</sup>	Unp <sup>105</sup>	Unh <sup>106</sup>	Uns <sup>107</sup>	Uno <sup>108</sup>	Une <sup>109</sup>	Unn <sup>110</sup>																																																																
<table border="1" style="margin-left: auto; margin-right: auto;"> <tr> <td>58</td><td>59</td><td>60</td><td>61</td><td>62</td><td>63</td><td>64</td><td>65</td><td>66</td><td>67</td><td>68</td><td>69</td><td>70</td><td>71</td> </tr> <tr> <td>Ce</td><td>Pr</td><td>Nd</td><td>Pm</td><td>Sm</td><td>Eu</td><td>Gd</td><td>Tb</td><td>Dy</td><td>Ho</td><td>Er</td><td>Tm</td><td>Yb</td><td>Lu</td> </tr> <tr> <td>90</td><td>91</td><td>92</td><td>93</td><td>94</td><td>95</td><td>96</td><td>97</td><td>98</td><td>99</td><td>100</td><td>101</td><td>102</td><td>103</td> </tr> <tr> <td>Th</td><td>Pa</td><td>U</td><td>Np</td><td>Pu</td><td>Am</td><td>Cm</td><td>Bk</td><td>Cf</td><td>Es</td><td>Fm</td><td>Md</td><td>No</td><td>Lr</td> </tr> </table>																		58	59	60	61	62	63	64	65	66	67	68	69	70	71	Ce	Pr	Nd	Pm	Sm	Eu	Gd	Tb	Dy	Ho	Er	Tm	Yb	Lu	90	91	92	93	94	95	96	97	98	99	100	101	102	103	Th	Pa	U	Np	Pu	Am	Cm	Bk	Cf	Es	Fm	Md	No	Lr
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