

**Physiotherapy and Voltage**

VG4/NMI  
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**What is the point of physiotherapy?**

- What are we trying to accomplish?
- What does it do?
- What do the different modes of therapy do? (Diathermy, sine wave, etc.)
- Why invest in the equipment?
- What kind of equipment to invest in?

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**Lindlahr's 3 primary causes of disease**

1. Lowered vitality\*
2. Abnormal composition of blood and lymph
3. Accumulation of morbid matter and poisons

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1. Cells run between pH 7.34 -7.45

2. pH = potential hydrogen: a measure of voltage

3. "Volt" = the difference in electrical potential between 2 points;  
the work needed to move a unit of charge between 2 points

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1 Volt = 1 watt of power *per* 1 ampere of current

Voltage is the electrical "tension" between two points

A voltage of +400 mV = pH of 0; electron stealer with 400 mV of power  
A voltage of -400 mV = pH of 14; electron donor with 400 mV of power  
A pH of 7 = 0 mV – electrically neutral (eg. pure water)

**Voltage = electron flow**

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**Cellular function**

pH of 7.35 = -20 milli-volts (mV)  
pH of 7.45 = -25 mV

The average healthy cell runs between -20 and -25 mV of electron donor status

"All disease is acidic" = disease occurs when voltage is low: pH is (+)  
"Alkaline pH" = electrons are available to do work: pH is (-)

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Salivary and Urinary pH are about 0.8 pH units less than cell pH

Salivary pH mostly demonstrates cellular voltage  
 Urinary pH mostly demonstrates extra-cellular fluid pH  
 When normal, both should be about 6.5

$6.5 + 0.8 = 7.3 = -20 \text{ mV}$

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- -50 mV = pH 7.88 healing or making new cells
- -35 mV = pH 7.61 normal for children
- -25 mV = pH 7.44 normal for adults

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- -15 mV = pH 7.26 tired
- -10 mV = pH 7.18 sick
- 0 = pH 7 neutral: polarity changes
- +30 mV = pH 6.48 cancer occurs

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**Inflammation**

- Inflammation = increasing the -mV
- Cellular repair and regeneration occurs at -50 mV (inflammation)
- Chronic inflammation occurs between -35 and -45 mV:
  - Not enough voltage to complete repair or regeneration
  - Voltage must increase to complete repair or healing

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**Physiotherapy**

Diathermy  
Galvanic  
Sine wave  
Ultraviolet  
Magnets  
Any electromagnetic supply source

All are means of adding voltage (electrons) to the tissues  
Voltage drives tissue repair

Acupuncture redirects or corrects internal voltage flow

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Physiotherapy is a means to add energy to the  
healing process.

Physiotherapy is a means to enhance or increase vitality.

(Measuring voltage is a means to quantify the vitality.)

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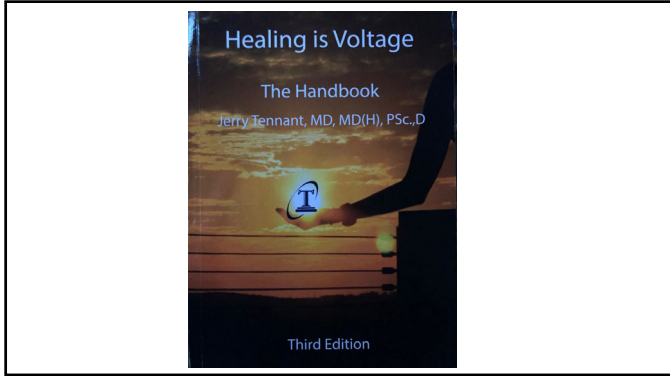
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