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**Anna Salanti**

Date: 11/30/2015

Next Test Due: 5/30/2016

# *LabAssist™ Foundational Wellness Profile Report*

## *Practitioner*

*Printed on Thursday, December 31, 2015 for:*

**Anna Salanti**
7619 SW 26th Ave.
Portland, OR 97219
503-977-2660
503-244-9946 (fax)

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# Basic Status High/Low - Plasma Amino Acids on 11/30/2015

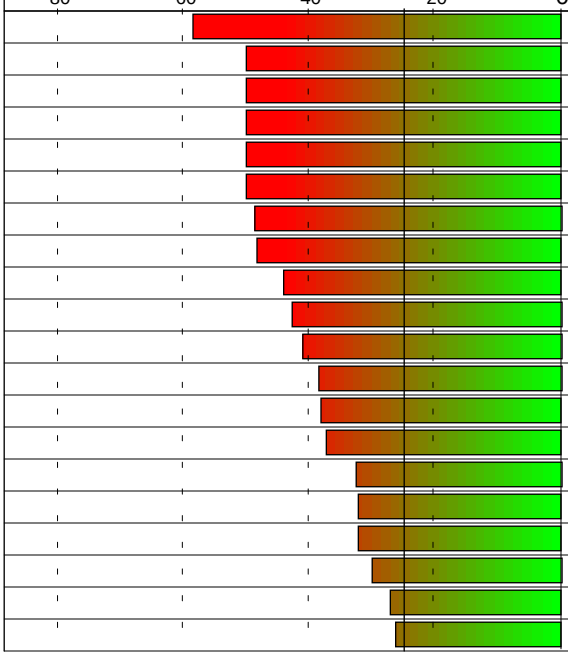
**Anna Salanti** **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 Anna Salanti (2718)

Client ID:555986644 (8322) 503-977-2660

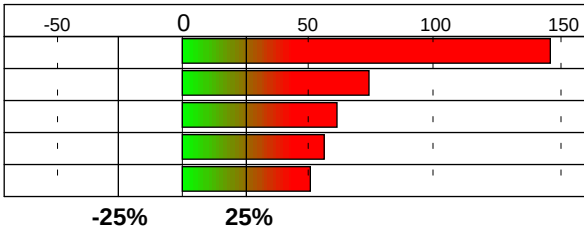
The % Status is the weighted deviation of the laboratory result.

## *Low Results*




| | % Status | | Result | *Low* | *High* |
|---|---|---|---|---|---|
| Phosphoserine | -58.33 | **L** | **0.01** | 0.01 | 0.03 |
| Anserine | -50.00 | **L** | **0.00** | 0.00 | 0.20 |
| Asparagine | -50.00 | **L** | **3.50** | 3.50 | 7.50 |
| Carnosine | -50.00 | **L** | **0.00** | 0.00 | 0.20 |
| Cystathionine | -50.00 | **L** | **0.00** | 0.00 | 0.05 |
| GABA | -50.00 | **L** | **0.00** | 0.00 | 0.20 |
| Glutamine/Glutamate | -48.36 | **L** | **10.00** | 8.50 | 100.00 |
| Serine | -48.00 | **L** | **6.20** | 6.00 | 16.00 |
| Asparagine/Aspartate | -44.05 | **L** | **13.00** | 7.50 | 100.00 |
| Glutamine | -42.59 | **L** | **38.00** | 36.00 | 63.00 |
| Aspartic Acid | -41.03 | **L** | **0.28** | 0.15 | 1.60 |
| Threonine | -38.57 | **L** | **9.60** | 8.00 | 22.00 |
| a-Amino-N-Butyric Acid | -38.00 | **L** | **1.10** | 0.80 | 3.30 |
| Glutamic Acid | -36.92 | **L** | **3.70** | 2.00 | 15.00 |
| Phosphoethanolamine | -32.61 | **L** | **0.24** | 0.08 | 1.00 |
| Ammonia | -32.00 | **L** | **5.40** | 0.00 | 30.00 |
| Lysine | -31.82 | **L** | **17.00** | 15.00 | 26.00 |
| Tyrosine | -30.00 | **L** | **5.20** | 4.00 | 10.00 |
| Glycine | -27.14 | **L** | **23.00** | 15.00 | 50.00 |
| Phenylalanine | -26.00 | **L** | **5.20** | 4.00 | 9.00 |

## *High Results*




| | % Status | | Result | *Low* | *High* |
|---|---|---|---|---|---|
| Hydroxyproline | 146.30 | **H** | **5.30** | 0.00 | 2.70 |
| b-Aminoisobutyric Acid | 74.00 | **H** | **0.62** | 0.00 | 0.50 |
| 3-Methylhistidine | 61.11 | **H** | **5.00** | 0.00 | 4.50 |
| Cystine | 56.67 | **H** | **6.80** | 2.00 | 6.50 |
| Sarcosine | 51.25 | **H** | **0.81** | 0.00 | 0.80 |

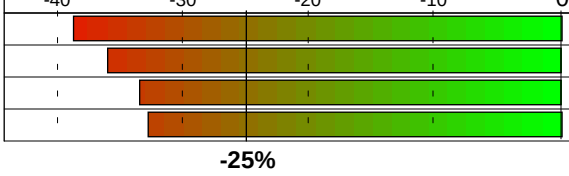
# Basic Status High/Low - Blood Test on 11/30/2015

**Anna Salanti** — **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 — Anna Salanti (2718)

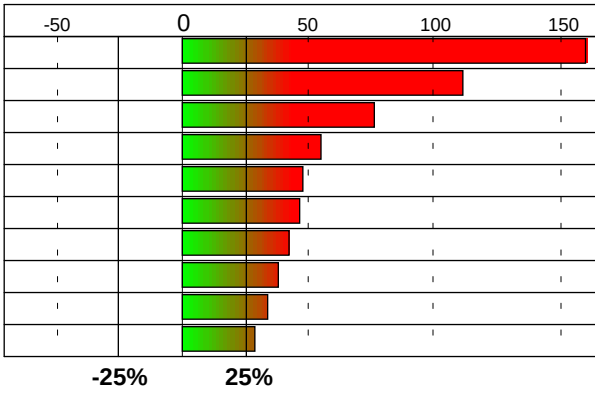
The % Status is the weighted deviation of the laboratory result.

## *Low Results*




| | % Status | | Result | *Low* | *High* |
|---|---|---|---|---|---|
| HDL-Cholesterol | -38.75 | **L** | **49.00** | 40.00 | 120.00 |
| Lymphocytes | -35.94 | **L** | **18.50** | 14.00 | 46.00 |
| Basophils | -33.33 | **L** | **0.50** | 0.00 | 3.00 |
| R.B.C. | -32.78 | **L** | **4.03** | 3.77 | 5.28 |

## *High Results*




| | % Status | | Result | *Low* | *High* |
|---|---|---|---|---|---|
| LDL | 218.33 | **H** | **221.00** | 60.00 | 120.00 |
| Cholesterol | 111.00 | **H** | **301.00** | 140.00 | 240.00 |
| B.U.N./Creatinine Ratio | 75.80 | **H** | **29.87** | 11.00 | 26.00 |
| Triglycerides | 54.62 | **H** | **156.00** | 20.00 | 150.00 |
| MCV | 47.37 | **H** | **96.53** | 79.00 | 97.00 |
| Glucose | 47.06 | **H** | **98.00** | 65.00 | 99.00 |
| MCH | 42.28 | **H** | **32.51** | 26.60 | 33.00 |
| sGPT | 38.24 | **H** | **36.00** | 6.00 | 40.00 |
| Neutrophils | 33.53 | **H** | **68.40** | 40.00 | 74.00 |
| B.U.N. | 28.95 | **H** | **23.00** | 8.00 | 27.00 |

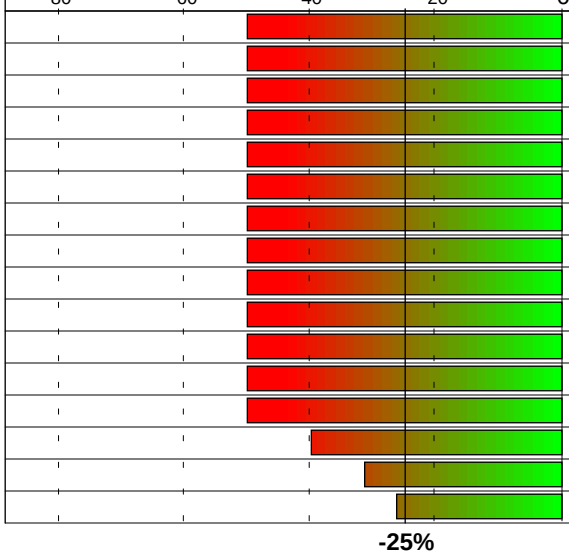
# Basic Status High/Low - Urine Organic Acids on 11/30/2015

**Anna Salanti** — **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 — Anna Salanti (2718)

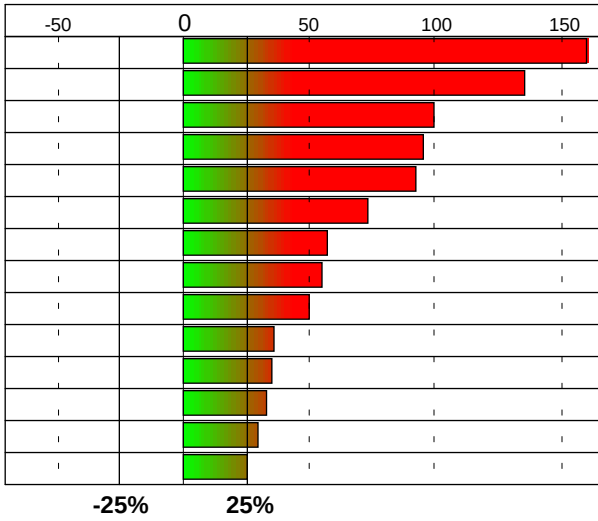
The % Status is the weighted deviation of the laboratory result.

## *Low Results*




| | % Status | | Result | Low | High |
|---|---|---|---|---|---|
| Adipate | -50.00 | L | **0.00** | 0.00 | 6.20 |
| a-Hydroxybutyrate | -50.00 | L | **0.00** | 0.00 | 0.30 |
| a-Keto-b-methylvalerate | -50.00 | L | **0.00** | 0.00 | 0.38 |
| a-Ketoisocaproate | -50.00 | L | **0.00** | 0.00 | 0.34 |
| a-Ketoisovalerate | -50.00 | L | **0.00** | 0.00 | 0.25 |
| Benzoate | -50.00 | L | **0.00** | 0.00 | 0.60 |
| b-Hydroxybutyrate | -50.00 | L | **0.00** | 0.00 | 2.10 |
| DHPP | -50.00 | L | **0.00** | 0.00 | 0.05 |
| Fumarate | -50.00 | L | **0.00** | 0.00 | 0.59 |
| Phenylacetate | -50.00 | L | **0.00** | 0.00 | 0.11 |
| Phenylpropionate | -50.00 | L | **0.00** | 0.00 | 0.06 |
| Pyruvate | -50.00 | L | **0.00** | 0.00 | 3.90 |
| Tricarballylate | -50.00 | L | **0.00** | 0.00 | 0.73 |
| D-Lactate | -39.47 | L | **0.20** | 0.00 | 1.90 |
| 8-Hydroxy-2-deoxyguan | -31.13 | L | **1.00** | 0.00 | 5.30 |
| 2-Methylhippurate | -26.19 | L | **0.02** | 0.00 | 0.08 |

## *High Results*



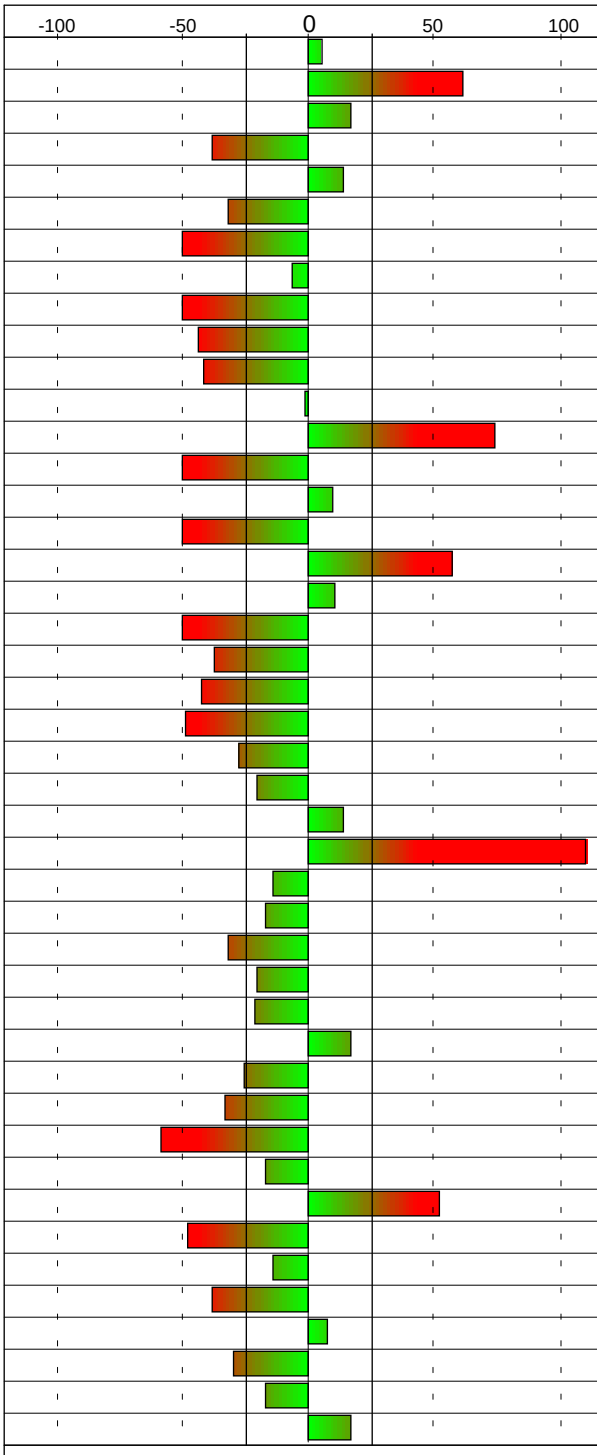

| | % Status | | Result | Low | High |
|---|---|---|---|---|---|
| 5-Hydroxyindoleacetate | 161.43 | H | **9.50** | 2.10 | 5.60 |
| Malate | 135.71 | H | **2.60** | 0.00 | 1.40 |
| Orotate | 99.28 | H | **1.03** | 0.00 | 0.69 |
| Hippurate | 95.07 | H | **795.00** | 0.00 | 548.00 |
| Formiminoglutamic Acid | 91.67 | H | **1.70** | 0.00 | 1.20 |
| Sulfate | 73.04 | H | **2667.00** | 958.00 | 2347.00 |
| Citrate | 57.34 | H | **641.00** | 56.00 | 601.00 |
| Glucarate | 54.76 | H | **6.60** | 0.00 | 6.30 |
| Kynurenate | 50.00 | H | **1.00** | 0.00 | 1.00 |
| Suberate | 35.71 | H | **1.80** | 0.00 | 2.10 |
| p-Hydroxyphenyllactate | 34.62 | H | **0.33** | 0.00 | 0.39 |
| Hydroxymethylglutarate | 33.33 | H | **3.00** | 0.00 | 3.60 |
| Succinate | 29.31 | H | **9.20** | 0.00 | 11.60 |
| b-Hydroxyisovalerate | 25.00 | H | **5.70** | 0.00 | 7.60 |

# Basic Status Alphabetic - Plasma Amino Acids on 11/30/2015

**Anna Salanti** **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 Anna Salanti (2718)

The % Status is the weighted deviation of the laboratory result relative to the range.



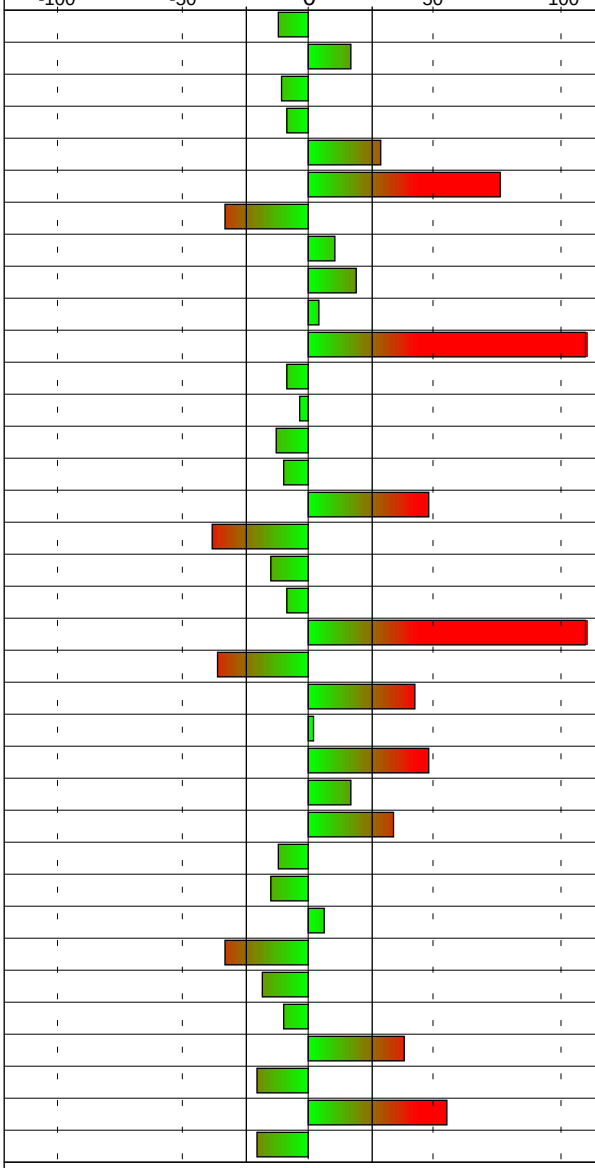

| | % Status | | Result | Low | High |
|---|---|---|---|---|---|
| 1-Methylhistidine | 4.67 | | 0.82 | 0.00 | 1.50 |
| **3-Methylhistidine** | **61.11** | **H** | **5.00** | 0.00 | 4.50 |
| a-Aminoadipic Acid | 16.67 | | 0.20 | 0.00 | 0.30 |
| **a-Amino-N-Butyric Acid** | **-38.00** | **L** | **1.10** | 0.80 | 3.30 |
| Alanine | 14.10 | | 47.00 | 22.00 | 61.00 |
| **Ammonia** | **-32.00** | **L** | **5.40** | 0.00 | 30.00 |
| **Anserine** | **-50.00** | **L** | **0.00** | 0.00 | 0.20 |
| Arginine | -6.47 | | 8.20 | 4.50 | 13.00 |
| **Asparagine** | **-50.00** | **L** | **3.50** | 3.50 | 7.50 |
| **Asparagine/Aspartate** | **-44.05** | **L** | **13.00** | 7.50 | 100.00 |
| **Aspartic Acid** | **-41.03** | **L** | **0.28** | 0.15 | 1.60 |
| b-Alanine | -1.00 | | 0.49 | 0.00 | 1.00 |
| **b-Aminoisobutyric Acid** | **74.00** | **H** | **0.62** | 0.00 | 0.50 |
| **Carnosine** | **-50.00** | **L** | **0.00** | 0.00 | 0.20 |
| Citrulline | 9.09 | | 4.20 | 1.60 | 6.00 |
| **Cystathionine** | **-50.00** | **L** | **0.00** | 0.00 | 0.05 |
| **Cystine** | **56.67** | **H** | **6.80** | 2.00 | 6.50 |
| Ethanolamine | 10.91 | | 0.87 | 0.20 | 1.30 |
| **GABA** | **-50.00** | **L** | **0.00** | 0.00 | 0.20 |
| **Glutamic Acid** | **-36.92** | **L** | **3.70** | 2.00 | 15.00 |
| **Glutamine** | **-42.59** | **L** | **38.00** | 36.00 | 63.00 |
| **Glutamine/Glutamate** | **-48.36** | **L** | **10.00** | 8.50 | 100.00 |
| **Glycine** | **-27.14** | **L** | **23.00** | 15.00 | 50.00 |
| Histidine | -20.00 | | 6.50 | 5.00 | 10.00 |
| Homocystine | 14.00 | | 0.03 | 0.00 | 0.05 |
| **Hydroxyproline** | **146.30** | **H** | **5.30** | 0.00 | 2.70 |
| Isoleucine | -13.49 | | 6.00 | 3.70 | 10.00 |
| Leucine | -16.67 | | 11.00 | 7.50 | 18.00 |
| **Lysine** | **-31.82** | **L** | **17.00** | 15.00 | 26.00 |
| Methionine | -20.00 | | 2.20 | 1.60 | 3.60 |
| Methionine sulfoxide | -21.00 | | 0.29 | 0.00 | 1.00 |
| Ornithine | 16.67 | | 11.00 | 3.00 | 15.00 |
| **Phenylalanine** | **-26.00** | **L** | **5.20** | 4.00 | 9.00 |
| **Phosphoethanolamine** | **-32.61** | **L** | **0.24** | 0.08 | 1.00 |
| **Phosphoserine** | **-58.33** | **L** | **0.01** | 0.01 | 0.03 |
| Proline | -16.67 | | 17.00 | 10.00 | 31.00 |
| **Sarcosine** | **51.25** | **H** | **0.81** | 0.00 | 0.80 |
| **Serine** | **-48.00** | **L** | **6.20** | 6.00 | 16.00 |
| Taurine | -14.35 | | 8.60 | 4.50 | 16.00 |
| **Threonine** | **-38.57** | **L** | **9.60** | 8.00 | 22.00 |
| Tryptophan | 7.50 | | 5.30 | 3.00 | 7.00 |
| **Tyrosine** | **-30.00** | **L** | **5.20** | 4.00 | 10.00 |
| Urea | -16.67 | | 410.00 | 200.00 | 830.00 |
| Valine | 16.67 | | 25.00 | 13.00 | 31.00 |
| **Total Status Deviation** | **33.44** | | | | |
| **Total Status Skew** | **-10.73** | | | | |

# Basic Status Alphabetic - Blood Test on 11/30/2015

**Anna Salanti** **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 Anna Salanti (2718)

The % Status is the weighted deviation of the laboratory result relative to the range.



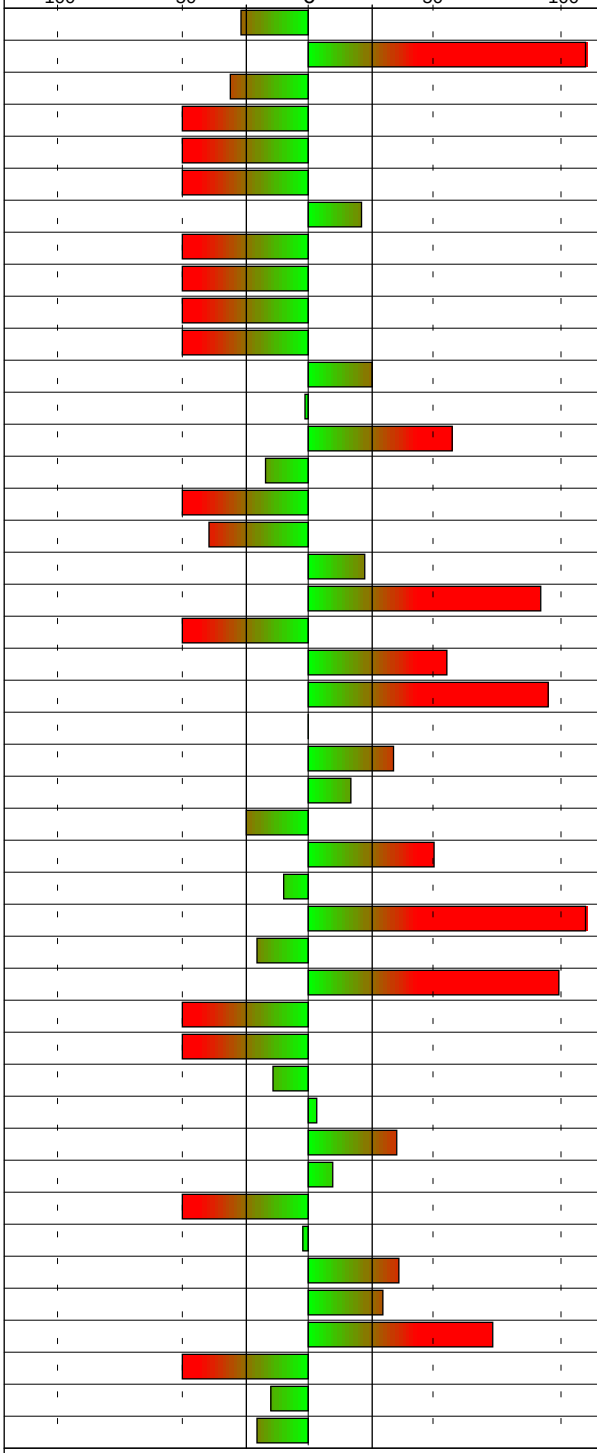

| | % Status | | Result | Low | High |
|---|---|---|---|---|---|
| A/G Ratio | -12.17 | | 1.63 | 1.10 | 2.50 |
| Albumin | 16.67 | | 4.40 | 3.60 | 4.80 |
| Alkaline Phosphatase | -10.71 | | 80.00 | 25.00 | 165.00 |
| Anion Gap | -9.00 | | 12.10 | 8.00 | 18.00 |
| **B.U.N.** | **28.95** | **H** | **23.00** | 8.00 | 27.00 |
| **B.U.N./Creatinine Ratio** | **75.80** | **H** | **29.87** | 11.00 | 26.00 |
| **Basophils** | **-33.33** | **L** | **0.50** | 0.00 | 3.00 |
| Bilirubin, Total | 10.00 | | 0.80 | 0.20 | 1.20 |
| Calcium | 18.75 | | 9.70 | 8.60 | 10.20 |
| Chloride | 4.55 | | 103.00 | 97.00 | 108.00 |
| **Cholesterol** | **111.00** | **H** | **301.00** | 140.00 | 240.00 |
| CO2 | -8.33 | | 26.00 | 21.00 | 33.00 |
| Creatinine | -3.49 | | 0.77 | 0.57 | 1.00 |
| Eosinophils | -12.86 | | 2.60 | 0.00 | 7.00 |
| Globulin | -10.00 | | 2.70 | 1.50 | 4.50 |
| **Glucose** | **47.06** | **H** | **98.00** | 65.00 | 99.00 |
| **HDL-Cholesterol** | **-38.75** | **L** | **49.00** | 40.00 | 120.00 |
| Hematocrit | -14.55 | | 38.90 | 35.00 | 46.00 |
| Hemoglobin | -8.33 | | 13.10 | 11.10 | 15.90 |
| **LDL** | **218.33** | **H** | **221.00** | 60.00 | 120.00 |
| **Lymphocytes** | **-35.94** | **L** | **18.50** | 14.00 | 46.00 |
| **MCH** | **42.28** | **H** | **32.51** | 26.60 | 33.00 |
| MCHC | 1.81 | | 33.68 | 31.50 | 35.70 |
| **MCV** | **47.37** | **H** | **96.53** | 79.00 | 97.00 |
| Monocytes | 16.67 | | 10.00 | 4.00 | 13.00 |
| **Neutrophils** | **33.53** | **H** | **68.40** | 40.00 | 74.00 |
| Platelet Count | -11.45 | | 246.00 | 140.00 | 415.00 |
| Potassium | -14.71 | | 4.10 | 3.50 | 5.20 |
| Protein, Total | 6.00 | | 7.40 | 6.00 | 8.50 |
| **R.B.C.** | **-32.78** | **L** | **4.03** | 3.77 | 5.28 |
| RDW | -17.74 | | 13.30 | 12.30 | 15.40 |
| sGOT | -10.00 | | 22.00 | 10.00 | 40.00 |
| **sGPT** | **38.24** | **H** | **36.00** | 6.00 | 40.00 |
| Sodium | -20.00 | | 137.00 | 134.00 | 144.00 |
| **Triglycerides** | **54.62** | **H** | **156.00** | 20.00 | 150.00 |
| W.B.C. | -20.77 | | 5.90 | 4.00 | 10.50 |
| **Total Status Deviation** | **29.28** | | | | |
| **Total Status Skew** | **8.58** | | | | |

# Basic Status Alphabetic - Urine Organic Acids on 11/30/2015

**Anna Salanti** **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 Anna Salanti (2718)

The % Status is the weighted deviation of the laboratory result relative to the range.




| | % Status | | Result | Low | High |
|---|---|---|---|---|---|
| **2-Methylhippurate** | **-26.19** | **L** | **0.02** | 0.00 | 0.08 |
| **5-Hydroxyindoleacetate** | **161.43** | **H** | **9.50** | 2.10 | 5.60 |
| **8-Hydroxy-2-deoxyguan** | **-31.13** | **L** | **1.00** | 0.00 | 5.30 |
| **Adipate** | **-50.00** | **L** | **0.00** | 0.00 | 6.20 |
| **a-Hydroxybutyrate** | **-50.00** | **L** | **0.00** | 0.00 | 0.30 |
| **a-Keto-b-methylvalerate** | **-50.00** | **L** | **0.00** | 0.00 | 0.38 |
| a-Ketoglutarate | 21.05 | | 13.50 | 0.00 | 19.00 |
| **a-Ketoisocaproate** | **-50.00** | **L** | **0.00** | 0.00 | 0.34 |
| **a-Ketoisovalerate** | **-50.00** | **L** | **0.00** | 0.00 | 0.25 |
| **Benzoate** | **-50.00** | **L** | **0.00** | 0.00 | 0.60 |
| **b-Hydroxybutyrate** | **-50.00** | **L** | **0.00** | 0.00 | 2.10 |
| **b-Hydroxyisovalerate** | **25.00** | **H** | **5.70** | 0.00 | 7.60 |
| cis-Aconitate | -1.52 | | 34.00 | 18.00 | 51.00 |
| **Citrate** | **57.34** | **H** | **641.00** | 56.00 | 601.00 |
| D-Arabinitol | -16.67 | | 12.00 | 0.00 | 36.00 |
| **DHPP** | **-50.00** | **L** | **0.00** | 0.00 | 0.05 |
| **D-Lactate** | **-39.47** | **L** | **0.20** | 0.00 | 1.90 |
| Ethylmalonate | 22.22 | | 2.60 | 0.00 | 3.60 |
| **Formiminoglutamic Acid** | **91.67** | **H** | **1.70** | 0.00 | 1.20 |
| **Fumarate** | **-50.00** | **L** | **0.00** | 0.00 | 0.59 |
| **Glucarate** | **54.76** | **H** | **6.60** | 0.00 | 6.30 |
| **Hippurate** | **95.07** | **H** | **795.00** | 0.00 | 548.00 |
| Homovanillate | 0.00 | | 3.80 | 1.90 | 5.70 |
| **Hydroxymethylglutarate** | **33.33** | **H** | **3.00** | 0.00 | 3.60 |
| Indican | 17.19 | | 43.00 | 0.00 | 64.00 |
| Isocitrate | -24.58 | | 54.00 | 39.00 | 98.00 |
| **Kynurenate** | **50.00** | **H** | **1.00** | 0.00 | 1.00 |
| Lactate | -10.00 | | 6.00 | 1.60 | 12.60 |
| **Malate** | **135.71** | **H** | **2.60** | 0.00 | 1.40 |
| Methylmalonate | -20.59 | | 0.50 | 0.00 | 1.70 |
| **Orotate** | **99.28** | **H** | **1.03** | 0.00 | 0.69 |
| **Phenylacetate** | **-50.00** | **L** | **0.00** | 0.00 | 0.11 |
| **Phenylpropionate** | **-50.00** | **L** | **0.00** | 0.00 | 0.06 |
| p-Hydroxybenzoate | -13.64 | | 0.40 | 0.00 | 1.10 |
| P-Hydroxyphenylacetate | 2.63 | | 10.00 | 0.00 | 19.00 |
| **p-Hydroxyphenyllactate** | **34.62** | **H** | **0.33** | 0.00 | 0.39 |
| Pyroglutamate | 9.32 | | 35.00 | 0.00 | 59.00 |
| **Pyruvate** | **-50.00** | **L** | **0.00** | 0.00 | 3.90 |
| Quinolinate | -2.50 | | 1.90 | 0.00 | 4.00 |
| **Suberate** | **35.71** | **H** | **1.80** | 0.00 | 2.10 |
| **Succinate** | **29.31** | **H** | **9.20** | 0.00 | 11.60 |
| **Sulfate** | **73.04** | **H** | **2667.00** | 958.00 | 2347.00 |
| **Tricarballylate** | **-50.00** | **L** | **0.00** | 0.00 | 0.73 |
| Vanilmandelate | -15.22 | | 2.40 | 1.60 | 3.90 |
| Xanthurenate | -20.59 | | 0.10 | 0.00 | 0.34 |
| **Total Status Deviation** | **42.94** | | | | |
| **Total Status Skew** | **2.72** | | | | |

## Nutritional Support

The following supplements may help to balance your biochemistry. Consult your practitioner.

- ☐ **1-5-HTP**
  **3x daily 100 mg**
- ☐ **1-CoEnzyme Q10**
  **2x daily 100 mg**
- ☐ **1-Digestive Enzymes**
  **With meals**
- ☐ **1-Folic Acid**
  **2x daily 800 mcg**
- ☐ **1-Oral Electrolyte - Balanced Formula**
  **2x daily**
- ☐ **2-Glycine**
  **2x daily 1000 mg**
- ☐ **H - Garlic**
  **1 - 3 times daily**
- ☐ **H - Ginseng (Panax)**
  **1 - 3 times daily**
- ☐ **H - Milk thistle**
  **1 - 3 times daily**

## Food Recommendations

The following foods may help to balance or strengthen your biochemistry.

| | | | |
|---|---|---|---|
| Artichoke | Bok Choy Cabbage | Broccoli | Cherries |
| Green Beans | Guava | Mango | Red Peppers |
| Strawberries | Swiss Chard | Wild Rice | |

## Foods to AVOID

The following foods may aggravate already out-of-balance biochemistry.

| | | | |
|---|---|---|---|
| Bacon | Cholesterol Rich Foods | Chuck Roast | Coconut Cream |
| Coconut Milk | Coffee | Dairy Cream | Egg Yolk |
| Eggplant | Green Tea | Hydrogenated Fats | Liver Pate |
| Margarine | Sweetbreads | | |

## Results Missing From Test

A more comprehensive report would have been generated if the following results were provided.

GGT Iron, Total

## Out-Of-Balance Panel Values

The following panels have a PSD of greater than 25% indicating need for further review. PSD is the Panel Status Deviation, or the average imbalance of that subset of results. The PSS is the Panel Status Skew, or the direction, negative (deficiency) or positive (excess), of that subset of results.

| Panel Name | PSD | PSS |
|---|---|---|
| Lipid | 105.67% | 86.30% |
| Carbohydrate Metabolism | 93.95% | 78.45% |
| Cardiac Risk | 86.54% | 67.04% |
| Inflammatory Process | 53.06% | 23.66% |
| Liver Detox Indicators | 52.10% | 26.70% |
| Gastrointest. Function | 50.80% | 39.24% |
| BCAA Catabolism | 50.00% | -50.00% |
| Connective Tissue | 47.72% | 32.49% |
| Neurotransmitters | 45.83% | 38.74% |
| CAC Cycle Ratios | 44.36% | 11.06% |
| Energy Production | 44.11% | 25.08% |
| Biochemical Ratios | 43.99% | 31.82% |
| B-Complex Markers | 43.98% | -10.64% |
| Muscle Metabolites | 41.44% | -8.56% |
| Carbohydrate Metabolism | 40.00% | -40.00% |
| Oxidative Stress | 36.32% | 32.72% |
| Nitrogen | 36.08% | 33.75% |
| Fatty Acid Metabolism | 35.98% | 2.65% |
| Intestinal Dysbiosis | 35.73% | -24.22% |
| Athletic Potential | 34.76% | 13.44% |
| Neuroendocrine Metab | 33.90% | -33.90% |
| Detoxification Markers | 33.63% | -14.74% |
| CNS Metabolism | 30.81% | -27.47% |
| Hepatic Metabolism | 30.24% | -6.02% |
| Magnesium Dependents | 29.99% | -23.32% |
| Adrenal Function | 29.13% | 9.39% |
| Ammonia/Energy | 27.59% | -19.51% |
| Gluconeogen | 27.06% | -18.42% |
| Immune Metabolites | 26.08% | -17.74% |
| Urea Cycle Metabolites | 26.07% | -18.72% |

## Lab Reported out-of-range Values

The following results are out-of-range (as reported by the lab), and should be carefully reviewed.

**LDL ( 218.33%)**

LDL is the cholesterol rich remnants of the lipid transport vehicle VLDL (very-low density lipoproteins). There have been many studies showing correlations between high levels of LDL and arterial artherosclerosis. Due to the expense of direct LDL measurement, a calculation known as the Friedewald formula is used (Total Cholesterol - HDL Cholesterol - Triglycerides/5). When Triglyceride levels are greater than 400, this method is not accurate. Increased levels are seen in high cholesterol diets, nephrotic syndromes, multiple myeloma, hepatic obstruction or disease, anorexia nervosa, diabetes, chronic renal failure, and premature coronary heart disease.

**Drugs which may have an adverse affect:**
Clofibrate

**Foods which may have an adverse affect:**
Coconut Milk

**5-Hydroxyindoleacetate ( 161.43%)**

An elevation of this metabolite of the breakdown of serotonin may be due to the use of serotonin-specific re-uptake inhibitor (SSRI) drugs or the release of serotonin from the central nervous system, intestinal argentaffin cells or platelets.

**Drugs which may have an adverse affect:**
Acetaminophen, Prozac, Reserpine

**Hydroxyproline ( 146.30%)**

May be indicative of bone resorption problems due to increased osteocalcin secretion. Hydroxyproline is a component of collagen. Vitamin C and iron are necessary cofactors.

**CA Cycle Phase 1 ( 138.53%)**

This is the first phase of the citric acid cycle moving from Citrate to cis-Aconitate. A high reading may indicate a disruption in the efficiency of energy production. It can also be due to a problem clearing ammonia due to an arginase enzyme deficiency.

**Malate ( 135.71%)**

A high level of this organic acid may be indicative of a need for certain nutrients such as niacin and Coenzyme Q10. If citrate, fumarate, and a-ketoglutarate are high as well, it may be due to a cytochrome C oxidase deficiency. Elevations of malate are also seen in individuals with Syndrome X. Tartaric acid has also been implicated, although theoretically, to block malate within the citric acid cycle.

**Drugs which may have an adverse affect:**
Lithium Carbonate

**Cholesterol ( 111.00%)**

Cholesterol is a fat, found in the blood which has been reported to be linked, when elevated, to an increased risk of cardiovascular disease. It is not a good independent risk factor but can be helpful in conjunction with HDL (good cholesterol), LDL (bad cholesterol) and the Cholesterol/HDL Ratio in assessing risk for heart disease. High levels may be caused by familial (hereditary) hypercholesterolemia, biliary obstruction, nephrotic syndrome, hypothyroidism, and pregnancy.

**Drugs which may have an adverse affect:**
Acetohexamide, Aspirin, Carbamazepine, Chlorpromazine, Chlorpropamide, Chlorthalidone, Clofibrate, Clonidine, Corticosteroids, Cortisone, Diclofenac, Furosemide, Ibuprofen, Imipramine, Lithium Carbonate, Methimazole, Miconazole, Nafarelin, Paramethadione, Penicillamine, Phenobarbital, Phenylbutazone, Phenytoin, Prednisone, Propranolol, Tamoxifen, Trimethadione, Viomycin

**Foods which may have an adverse affect:**
Bacon, Cholesterol Rich Foods, Chuck Roast, Coconut Cream, Coconut Milk, Dairy Cream, Egg Yolk, Hydrogenated Fats, Liver Pate, Margarine, Sweetbreads

**Orotate ( 99.28%)**

An elevated reading of this organic acid may be due to an arginine deficiency, ammonia intoxication, and by excessive lysine intake as well as an intracellular magnesium deficiency. Arginine, aspartic acid, alpha ketoglutarate, and magnesium may be helpful.

**Hippurate ( 95.07%)**

A high reading of this organic acid may be indicative of an overgrowth of intestinal microbiota due to the action of bacteria on phenylalanine, elevated levels of environmental toxins (typically solvents) or elevated ingestion of benzoic acid.

**Drugs which may have an adverse affect:**
Aspirin

**Formiminoglutamic Acid ( 91.67%)**

A high reading of this organic acid is suggestive of a folic acid deficiency. FIGLU is a compound derived from histidine and an insufficiency of folic acid leads to a high result.

**Drugs which may have an adverse affect:**
Ampicillin, Aspirin, Colchicine

**Foods which may have an adverse affect:**
Green Tea

**B.U.N./Creatinine Ratio ( 75.80%)**

This ratio is a good indicator of kidney and liver function. A high reading in this calculation is normally indicative of too much BUN being formed. Excessive protein intake, kidney damage, certain drugs, low fluid intake, intestinal bleeding, exercise, or heart failure can cause increases.

**Drugs which may have an adverse affect:**
Sildenafil, Tadalafil, Vardenafil

**b-Aminoisobutyric Acid ( 74.00%)**

May indicate a lack of transaminase enzyme. Also may show a possible protein deficiency.

**Sulfate ( 73.04%)**

High levels of sulfate in the urine may be indicative of a number of problems related to glutathione use and depletion. If urinary pyroglutamate and a-hydroxybutyrate are also elevated, this indicates an early stage of glutathione depletion as is suggests that the system is increasing the flow of sulfur compounds into the liver to meet a growing need for the antioxidant tri-peptide. If those two markers are not elevated, suspect a high intake of sulfur bearing foods or amino acids such as NAC (N-Acetyl-Cysteine), methionine or taurine.

**3-Methylhistidine ( 61.11%)**

This may be indicative of an abnormal rate of catabolism of muscle protein or an abnormal rate of turnover of muscle tissue. This may be a degenerative condition or due to strenuous physical activity. Also, inadequate levels of folate and B-12 may be the cause.

**Drugs which may have an adverse affect:**
Cortisol

**Phosphoserine ( -58.33%)**

No information available.

**Citrate ( 57.34%)**

A high reading of this organic acid may be indicative of an amino acid deficiency or a problem with metabolism.

**Cystine ( 56.67%)**

Cystine is the combination of two cysteine molecules combine. A sulfur amino acid, it is critical in the ability to detoxify the body. A high reading may indicate excessive supplementation with methionine, cystine, or N-acetylcysteine. Decreased renal clearance may also cause a high result. Excessive levels can be neurotoxic and adversely affect mental function.

**Glucarate ( 54.76%)**

Glucarate is a by-product of oxidation in the Phase 1 detoxification process involving cytochrome p450. Elevations may be indicative of toxic exposures, especially pesticides. Glycine and N-acetyl-cysteine are helpful supplements in reducing this reading. Elevations may also be seen in alcoholism, solvent exposure, excessive estrogen and/or testosterone and drugs such as aspirin, lorazepam, digoxin and morphine.

**Triglycerides ( 54.62%)**

Triglycerides is where most of the stored fat in the body resides. While high triglycerides are clearly associated with coronary heart disease, it is also been shown to be responsive to dietary changes.

**Drugs which may have an adverse affect:**
Chlorthalidone, Itraconazole, Levonorgestrel, Levothyroxine, Methyldopa, Miconazole, Polythiazide, Propranolol, Tamoxifen

**Foods which may have an adverse affect:**
Bacon, Cholesterol Rich Foods, Chuck Roast, Coconut Cream, Coconut Milk, Dairy Cream, Egg Yolk, Margarine, Sweetbreads

**Sarcosine ( 51.25%)**

Elevated sarcosine may be indicative of a functional deficiency of riboflavin (B2) this in turn may impair vitamin B6 metabolism and the conversion of tryptophan to niacin. Elevated levels in men with prostate cancer should be monitored and glycine supplementation and possibly methionine should be avoided.

**Adipate ( -50.00%)**
No known health issues are related to low levels of adipate.

**a-Hydroxybutyrate ( -50.00%)**
This organic acid is the last step of glutathione synthesis from methionine through cysteine. Low levels are desirable but not indicative of any positive or negative health issues.

**a-Keto-b-methylvalerate ( -50.00%)**
No known health issues are related to low levels of a-keto-ß-methylvalerate.

**a-Ketoisocaproate ( -50.00%)**
No known health issues are related to low levels of a-ketoisocaproate.

**a-Ketoisovalerate ( -50.00%)**
No known health issues are related to low levels of a-ketoisovalerate.

**Anserine ( -50.00%)**
No information available.

**Asparagine ( -50.00%)**
Asparagine is a non-essential amino acid synthesized from aspartic acid and ATP. A low result may be indicative of a functional magnesium deficiency.

**Benzoate ( -50.00%)**
A low reading in today's enviromentally toxic world may indicate a poor phase I detoxification capability.

**b-Hydroxybutyrate ( -50.00%)**
No known health issues are related to low levels of ß-hydroxybutyrate.

**Carnosine ( -50.00%)**
No information available.

**Cystathionine ( -50.00%)**
An important sulfur amino acid, low plasma cystathionine may be indicative of generally low sulfur containing amino acids. Cross correlate this result with taurine. May also show impaired glutathione production. Running a urine organic acid test may be necessary.

**DHPP ( -50.00%)**
No known health issues are related to low levels of DHPP.

**Fumarate ( -50.00%)**
Indicative of poor functioning or overstress on the citric acid cycle, a low reading of this organic acid may be suggestive of low levels of tyrosine and phenylalanine.

**GABA ( -50.00%)**
GABA is known as a neuroinhibitory amino acid that is derived from glutamic acid and seems to regulate nerve cell function.

**Kynurenate ( 50.00%)**
A high reading of this by-product of the breakdown of the amino acid tryptophan is consistent with a vitamin B6 deficiency, possible inflammatory processes, interferon-gamma stimulated macrophages or excessive tryptophan supplementation (not 5-HTP). Abnormally high levels can cause an increase in pain sensations and may, in multiple sclerosis patients, be a marker for an exacerbation period.

**Phenylacetate ( -50.00%)**
No known health issues are related to low levels of phenylacetate.

**Phenylpropionate ( -50.00%)**
No known health issues are related to low levels of phenylpropionate.

**Pyruvate ( -50.00%)**
No known health issues are related to low levels of pyruvate.

**Pyruvate to Lactate ( -50.00%)**
A low reading may be indicative of a blockade in the entry point of the citric acid cycle thereby impacting the ability of the body to derive energy from carbohydrates.

**Tricarballylate ( -50.00%)**
No known health issues are related to low levels of tricarballylate.

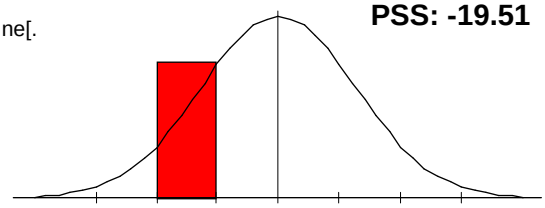
## Additional Tests
The following additional lab tests may help in diagnosis.

**Consider ordering apolipoprotein A-1 and B**
*Rationale: Panel Cardiac Risk Status Scew is > 0%*
*Panel Cardiac Risk Status Deviation is > 50%*

## Ammonia/Energy

Arginine, Threonine[L], Glycine[L], Serine[L], a-Aminoadipic Acid, Asparagine[L], Aspartic Acid[L], Citrulline, Glutamic Acid[L], Glutamine[.

**PSD: 27.59**
**PSS: -19.51**

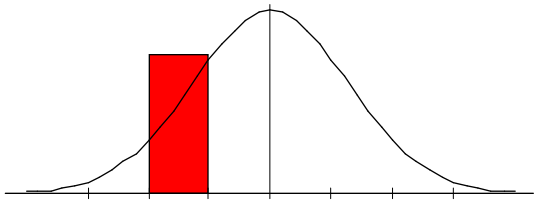


Ammonia influences a cell's ability to create energy. This panel shows your body's ability to rid excess ammonia buildup and maintain a healthy energy cycle. A profile like this may show you're not eating enough protein, you're unable to digest properly, or you're eating a poor quality of proteins.

## CNS Metabolism

Arginine, Tryptophan, GABA[L], Glycine[L], Serine[L], Taurine, Aspartic Acid[L], Glutamine[L], Ethanolamine, Phosphoethanolamine[L], Phospho.

**PSD: 30.81**
**PSS: -27.47**

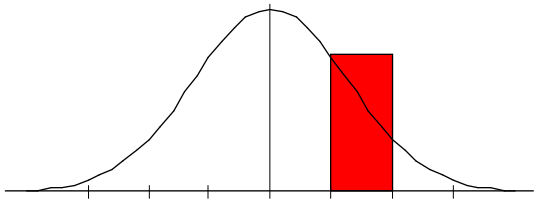


Amino acids are the basic building blocks of all the cells in our body. Amino acid metabolism is important for proper functioning of the nervous system. This profile may indicate poor central nervous system functioning. Symptoms include: memory loss, fatigue and poor concentration.

## Connective Tissue

Leucine, Methionine, Valine, Cystine[H], Hydroxyproline[H], 3-Methylhistidine[H], Proline.

**PSD: 47.72**
**PSS: 32.49**

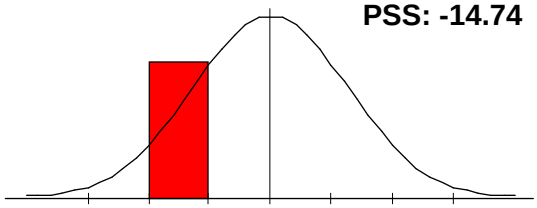


This panel shows whether there's an adequate supply and metabolism of amino acids necessary to produce healthy connective tissue and collagen. Necessary for healthy bone, joints, hair, skin, and cartilage. This profile may indicate missing enzymes and co-factors necessary in the production of healthy connective tissue and collagen. Symptoms include: brittle hair, dry skin, increased joint aches and pain. Review protein intake and quality of proteins.

## Detoxification Markers

Methionine, Cystine[H], Taurine, Glutamine[L], Glycine[L], Aspartic Acid[L].

**PSD: 33.63**
**PSS: -14.74**

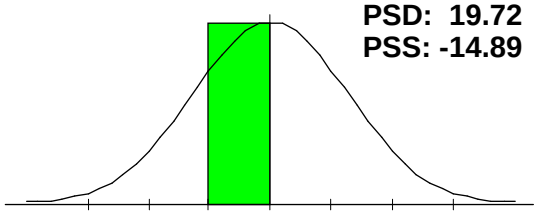


This panel reviews amino acids critical for proper detoxification. This includes detoxing medications, environmental toxins, and natural metabolic toxins. This profile may be indiciative of an inability to properly detoxify. Personalized supplementation is suggested.

## Essential Amino Acid

Arginine, Histidine, Isoleucine, Leucine, Lysine[L], Methionine, Phenylalanine[L], Threonine[L], Tryptophan, Valine.

**PSD: 19.72**
**PSS: -14.89**



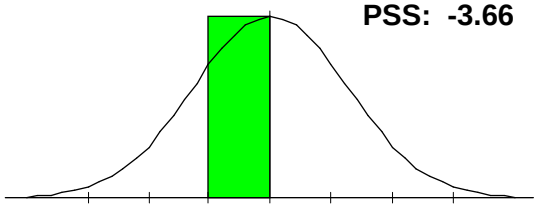
This panel reviews the essential amino acids the body can't produce and must get from the diet. These amino acids are necessary for all body functions. This profile shows a percent imbalance below 25%, so no abnormalities were found.

## Fat Metabolism

Arginine, Isoleucine, Leucine, Valine, Taurine, Glutamine[L], Sarcosine[H].

This panel shows your balance of amino acids critical to proper fat metabolism. Fat metabolism is important in many body functions. Improper metabolism can cause problems like hormonal issues and nerve disorders. This profile shows a percent imbalance below 25%, so no abnormalities were found.

**PSD: 23.07**
**PSS: -3.66**

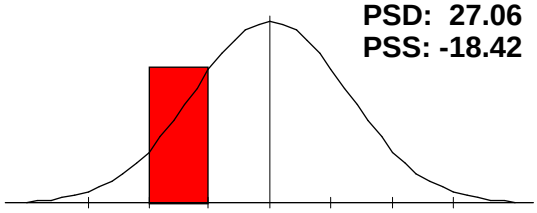


## Gluconeogen

Threonine[L], Tryptophan, Glycine[L], Serine[L], Alanine.

This panel shows whether you have the proper amino acids in balance to control blood sugar levels. This profile may indicate blood sugar control issues such as hypoglycemia or diabetes.

**PSD: 27.06**
**PSS: -18.42**

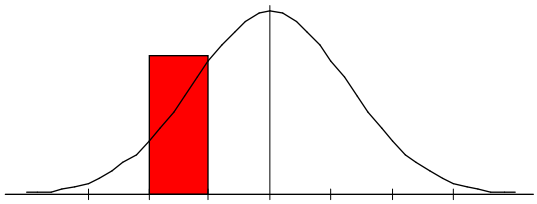


## Hepatic Metabolism

Methionine, Taurine, Glutamine[L], Cystine[H], Cystathionine[L], Homocystine, Alanine.

This panel shows whether you have adequate stores of the listed amino acids to optimize liver function. This is important because your liver is responsible for cleaning your blood of toxins. This profile may indicate you may not be consuming enough protein. Or that your liver is working so hard, it's using up these amino acids so quickly, it's outstripping your supply.

**PSD: 30.24**
**PSS: -6.02**

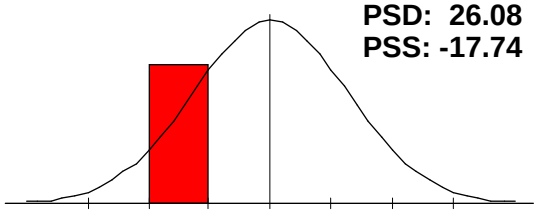


## Immune Metabolites

Arginine, Threonine[L], Glutamine[L], Ornithine.

This panel shows whether you have adequate amounts of the listed amino acids to properly fight off viral or bacterial infections. This profile may indicate a weak immune function - makiing it difficult for you to fight off infections. This may be caused by a low dietary protein intake.

**PSD: 26.08**
**PSS: -17.74**

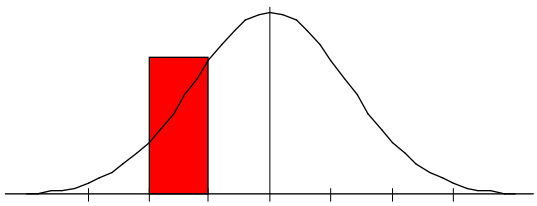


## Magnesium Dependents

Citrulline, Ethanolamine, Phosphoethanolamine[L], Phosphoserine[L], Serine[L], Methionine sulfoxide.

This panel shows whether you have adequate amounts of magnesium for proper amino acid function. Amino acids are extremely dependent on magnesium to function properly. This profile indicates a possible magnesium deficiency. Highly consider further laboratory testing to assess your magnesium levels.

**PSD: 29.99**
**PSS: -23.32**

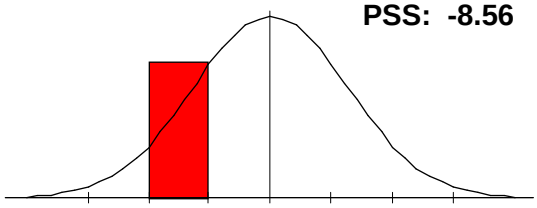


## Muscle Metabolites

Anserine[L], Carnosine[L], 1-Methylhistidine, 3-Methylhistidine[H].

Amino acids are the basic building blocks critical in building muscle tissue. This profile indicates you may not be able to build muscle properly. Symptoms include: not recovering from injuries well, not building muscle when working out, general weakness, and an inability to lose weight. Consider reviewing your diet. You may need to increase dietary protein intake.

**PSD: 41.44**
**PSS: -8.56**

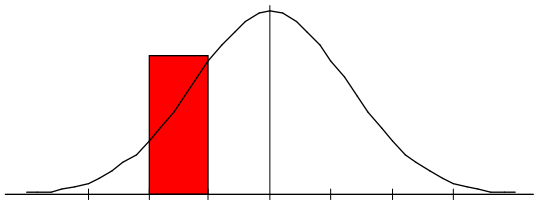


## Neuroendocrine Metab

GABA[L], Glycine[L], Serine[L], Taurine, Tyrosine[L].

This panel shows whether you have enough of the listed amino acids necessary for the proper functioning of your endocrine system. The endocrine system comprises the control organs of the body such as: thymus, pancreas, and thyroid. This profile may indicate you don't have an adequate amount of the listed amino acids to support your endocrine system, which causes it to underfunction. This may be due to a low dietary intake of quality protein.

**PSD: 33.90**
**PSS: -33.90**

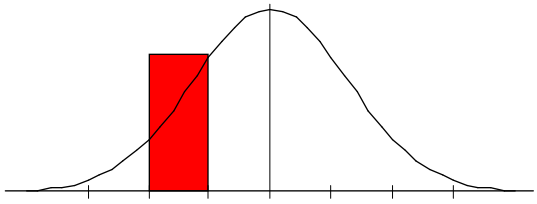


## Urea Cycle Metabolites

Arginine, Aspartic Acid[L], Citrulline, Ornithine, Glutamine[L], Asparagine[L], Urea.

This panel shows your supply of the amino acids related to the urea cycle. This metabolic process helps you remove excess ammonia from your system. This profile indicates you don't have an adequate supply of the listed amino acids necessary to flush out excess ammonia. Excess ammonia can cause neurological issues. Review your Supplement List Explanation.

**PSD: 26.07**
**PSS: -18.72**

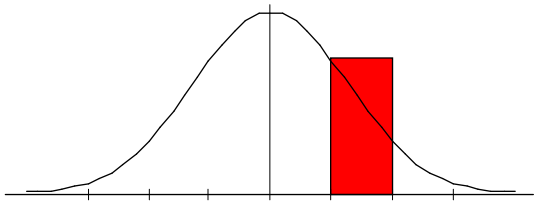


## Adrenal Function

Cholesterol[H], Eosinophils, Eosinophil Count, Potassium, Sodium, Chloride.

This panel assesses your production of adrenaline. Adrenaline affects your daily function, such as your ability to handle stress.This profile may be caused by a lack of essential nutrients to control adrenaline production. Symptoms include hyperactivity, poor circulation, fatigue and an inability to handle stress. This profile increases your risk for ADHD, hypertension, and cardiovascular disease.

**PSD: 29.13**
**PSS: 9.39**

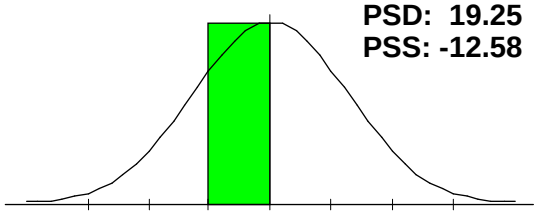


## Allergy

Eosinophils, Globulin, Lymphocytes[L], Monocytes, W.B.C..

This panel assesses your response to allergens from common sources such as foods, pets or pollens. This profile shows a percent imbalance below 25%, so no abnormalities were found.

**PSD: 19.25**
**PSS: -12.58**

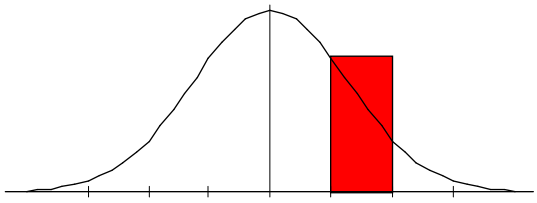


## Athletic Potential

B.U.N./Creatinine Ratio[H], Cholesterol[H], CO2, Creatinine, Potassium, Protein, Total, Sodium, HDL-Cholesterol[L].

**PSD: 34.76**
**PSS: 13.44**

This panel assesses your athletic potential and your ability to recover from injury. Maintaining a normal range helps optimize performance. Athletes require more nutrients because they deplete their supplies faster. This profile shows you may be at high risk for heart attacks, injury and general poor performance. Highly consider a complete physical before starting any exercise routine.

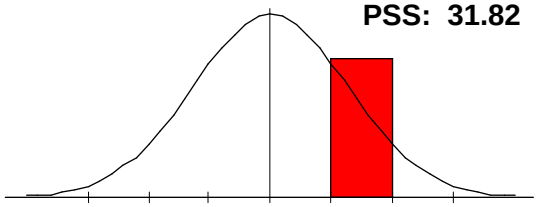


## Biochemical Ratios

A/G Ratio, B.U.N./Creatinine Ratio[H].

**PSD: 43.99**
**PSS: 31.82**

Ratios indicate your balance of chemistry. It's the ratios between your test results - not just how much you have of something - that indicate balance. This profile may indicate imbalances in you chemistry. This panel provides a good tracking mechanism for showing improvements in your biochemical status. Review your Supplement List Explanation.

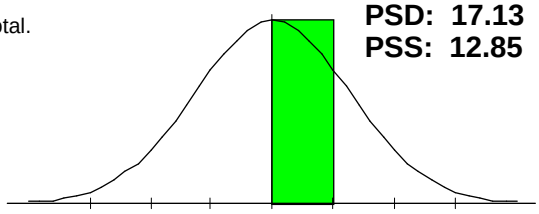


## Bone/Joint

Albumin, Alkaline Phosphatase, Calcium, Neutrophils[H], Protein, Total.

**PSD: 17.13**
**PSS: 12.85**

This panel helps assess bone and joint health. These markers show your body's ability to create healthy bones and joints. This profile shows a percent imbalance below 25%, so no abnormalities were found.

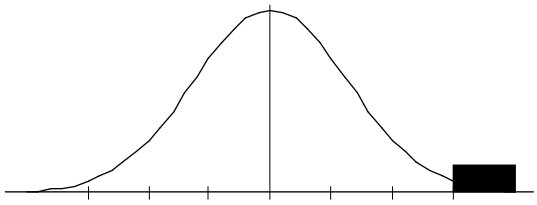


## Carbohydrate Metabolism

Glucose[H], HDL-Cholesterol[L], LDL[H], Cholesterol[H], Triglycerides[H].

**PSD: 93.95**
**PSS: 78.45**

This panel is helpful in assessing Type II Diabetic Risk and Hypoglycemic Risk. Maintaining a normal range may reduce your risk of blood sugar metabolism problems. This profile indicates poor carbohydrate metabolism, thus you are at high risk for Type II Diabetes, Insulin Resistance, and Metabolic Syndrome (Syndrome X). An elevated profile indicates the need for reviewing dietary and exercise habits and making the appropriate lifestyle changes. Additionally, a high profile suggests the need to assess liver function as this organ plays a pivotal role in carbohydrate metabolism.

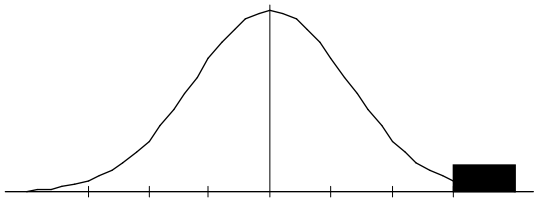


## Cardiac Risk

Cholesterol[H], sGOT, Triglycerides[H], HDL-Cholesterol[L], LDL[H].

**PSD: 86.54**
**PSS: 67.04**

This panel is helpful in assessing cardiovascular disease risk. Maintaining a normal range may reduce your risk of cardiovascular disease (CVD). The profile may indicate you are at greater risk for CVD than the general population. A review of dietary, environmental and personal habits should be done and appropriate lifestyle changes made. If both triglycerides and cholesterol are elevated, a regime of exercise and dietary changes are more likely to exhibit benefits. Also review Supplement Explanation List.cholesterol are elevated, a regime of exercise and dietary changes are more likely to exhibit benefits.

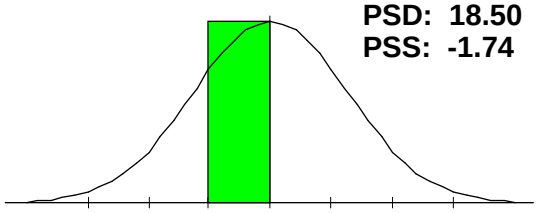


## Cellular Production

Alkaline Phosphatase, Anion Gap, Neutrophils[H], W.B.C..

**PSD: 18.50**
**PSS: -1.74**

This panel may be helpful in determining your body's ability to properly produce healthy cells. This profile shows a percent imbalance below 25%, so no abnormalities were found.

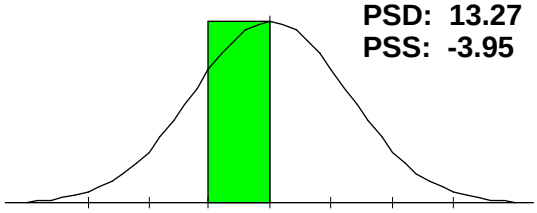


## Electrolyte Balance

Calcium, Chloride, CO2, Potassium, Sodium.

**PSD: 13.27**
**PSS: -3.95**

This panel represents the electrolyte balance in blood. Balance is critical in achieving optimal health. This profile shows a percent imbalance below 25%, so no abnormalities were found.

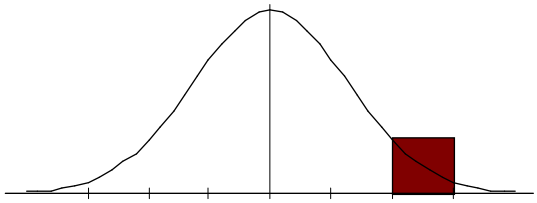


## Gastrointest. Function

Anion Gap, Chloride, Cholesterol[H], CO2, Monocytes, Potassium, Sodium, Triglycerides[H], LDL[H].

**PSD: 50.80**
**PSS: 39.24**

This panel helps assess gastrointestinal health. Keeping the elements listed in a normal range may improve digestion and the metabolism of proteins, fats and carbohydrates. This profile suggests the need for further evaluation of gastrointestinal integrity, digestion and absorption. Check for dysbiosis (bacterial overgrowth in the gut), food allergies or "leaky gut" syndrome.

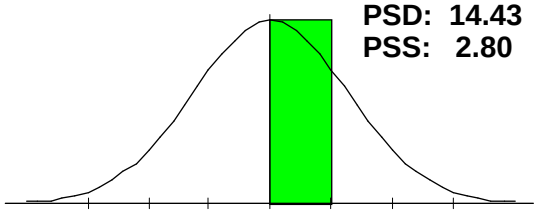


## Hydration

Albumin, Sodium, Potassium, Chloride, Calcium, CO2, Creatinine, B.U.N.[H].

**PSD: 14.43**
**PSS: 2.80**

Hydration is a key factor in being and staying healthy. Imbalances in this panel can point out whether a person is dehydrated or over hydrated.

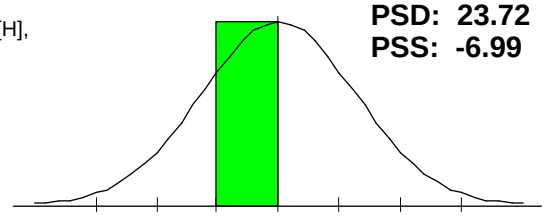


## Immune Response

Basophils[L], Eosinophils, Lymphocytes[L], Monocytes, Neutrophils[H], Globulin.

This panel helps assess immune system health. It shows the percentage of specific white blood cells needed for proper immune response. This profile shows a percent imbalance below 25%, so no abnormalities were found.

**PSD: 23.72**
**PSS: -6.99**

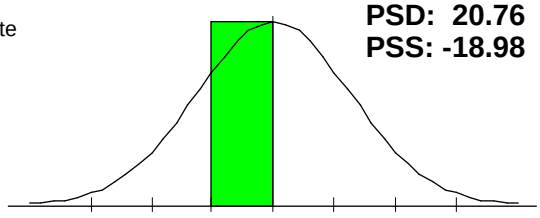


## Immune Response Count

Basophil Count[L], Eosinophil Count, Lymphocyte Count[L], Monocyte Count, Neutrophil Count.

This panel helps assess immune system health. It shows how many specific white blood cells your body has for proper immune response. This profile shows a percent imbalance below 25%, so no abnormalities were found.

**PSD: 20.76**
**PSS: -18.98**

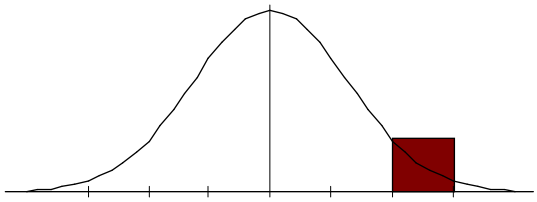


## Inflammatory Process

Eosinophils, LDL[H], Monocytes, Lymphocytes[L], Neutrophils[H], W.B.C., Basophils[L].

This panel helps assess any inflammatory processes that may be occuring in the body. This profile may show presence of an ongoing inflammatory process. Consider dietary changes such as avoiding saturated and trans fats. And review your Supplement Explanation List. We recommend the LEAP/MRT test to identify the foods and preservatives which may be increasing your inflammation.

**PSD: 53.06**
**PSS: 23.66**

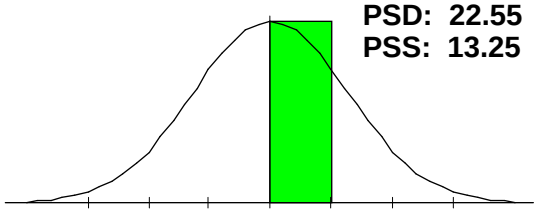


## Kidney Function

Albumin, B.U.N.[H], B.U.N./Creatinine Ratio[H], Chloride, CO2, Creatinine, Glucose[H], Potassium, Protein, Total, Sodium.

This panel helps assess kidney function. It is important to keep the elements of this subset in balance to help the body eliminate waste material. This profile shows a percent imbalance below 25%, so no abnormalities were found.

**PSD: 22.55**
**PSS: 13.25**

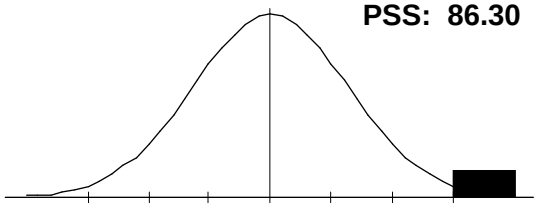


## Lipid

Cholesterol[H], Triglycerides[H], HDL-Cholesterol[L], LDL[H].

Lipid assessment is important in helping achieve optimal wellness as well as reducing cardiovascular disease risk. The profile suggests you may be at higher risk for coronary heart disease than the general population. Review your diet and avoid trans and saturated fats. Plus refer to your Supplement List Explanation.

**PSD: 105.67**
**PSS: 86.30**

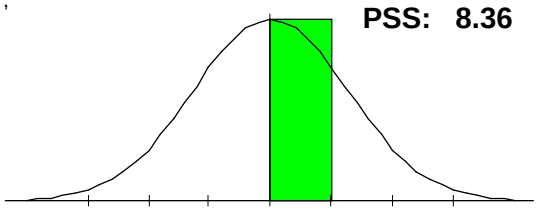


## Liver Function

Albumin, Alkaline Phosphatase, Bilirubin, Total, Protein, Total, sGOT, sGPT[H].

Assessing liver function helps determine your body's ability to detoxify environmental toxins, stress hormones, drugs and other chemical toxins. It also shows your ability to process amino acids and other important biological processes. This profile shows a percent imbalance below 25%, so no abnormalities were found.

**PSD: 15.27**
**PSS: 8.36**

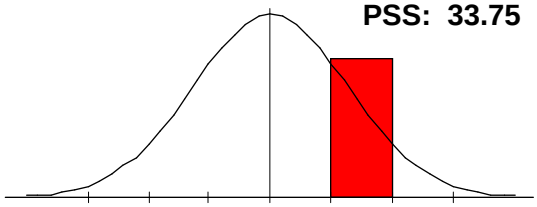


## Nitrogen

B.U.N.[H], B.U.N./Creatinine Ratio[H], Creatinine.

Nitrogen is a major component of protein. This panel assesses if there's adequate protein in the diet and if the body metabolizes (uses) proteins properly. This profile suggests a review of the kidney function. The high reading may be caused by excessive protein intake or high gut bacteria. Consider running a cardiovascular risk assessment.

**PSD: 36.08**
**PSS: 33.75**

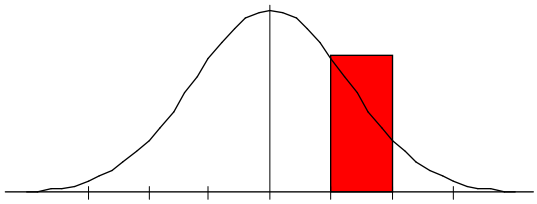


## Oxidative Stress

Anion Gap, Bilirubin, Total, Chloride, Cholesterol[H], Glucose[H].

Oxidation is like the rusting of cells. Reducing oxidation is critical for healthy cell function and to slow the aging process. This profile may indicate a need for more antioxidants. And shows you may need to make appropriate lifestyle changes (e.g.: quit smoking, quit/reduce alcohol, reduce stress, etc.). Consider supplementing with a varied, broad spectrum of antioxidants rather than one or two alone.

**PSD: 36.32**
**PSS: 32.72**

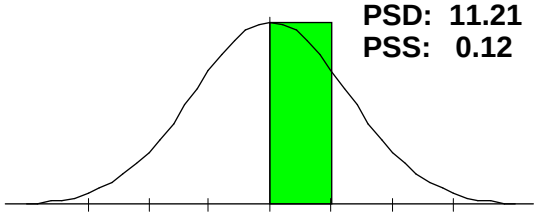


## Protein

A/G Ratio, Albumin, Globulin, Protein, Total.

Proteins are the basic building blocks of all cells including: hormones, muscle, neurotransmitters, immune systems responses and more. Assessing their competency is crucial in achieving optimal wellness. This profile shows a percent imbalance below 25%, so no abnormalities were found.

**PSD: 11.21**
**PSS: 0.12**

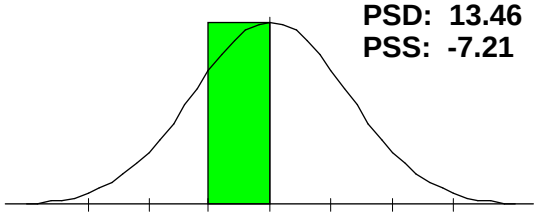


## Pulmonary Function

Anion Gap, Calcium, CO2, Potassium, sGOT, Sodium.

This panel helps assess lung and respiratory function. This profile shows a percent imbalance below 25%, so no abnormalities were found.

**PSD: 13.46**
**PSS: -7.21**

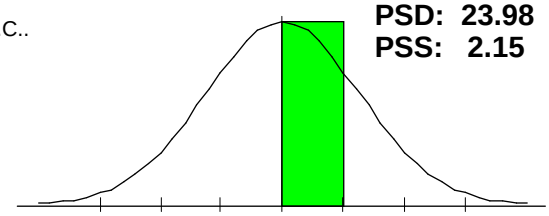


## Red Blood Cell Health

Hematocrit, Hemoglobin, MCH[H], MCHC, MCV[H], R.B.C.[L], W.B.C..

This panel assesses the production of red blood cells and their function. This profile shows a percent imbalance below 25%, so no abnormalities were found.

**PSD: 23.98**
**PSS: 2.15**

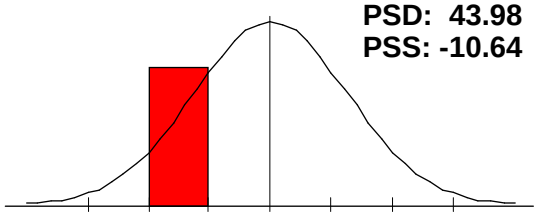


## B-Complex Markers

b-Hydroxyisovalerate[H], a-Ketoisovalerate[L], a-Ketoisocaproate[L], a-Keto-b-methylvalerate[L], Methylmalonate, Formiminoglutamic Acid[H],.

This panel assesses adequate intake of B-complex vitamins. This profile may indicate a poor aminio acid metabolism or a lack of quality protein in the diet.

**PSD: 43.98**
**PSS: -10.64**

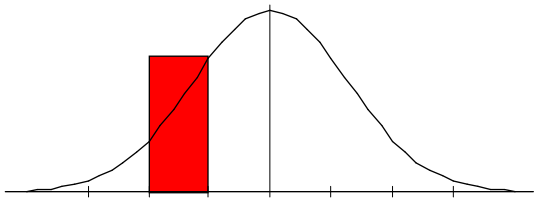


## BCAA Catabolism

a-Ketoisovalerate[L], a-Ketoisocaproate[L], a-Keto-b-methylvalerate[L].

BCAA's are essential in building muscle and you can only get them from your diet or supplements. This panel assess your BCAA levels and how they're being used. This profile may indicate an inadequate supply of BCAAs. Consider supplementation. Note: supplementing with single branch chain amino acids is highly not recommended. All 3 branch chain amino acids (Isoleucine, Leucine and Valine) must be taken together.

**PSD: 50.00**
**PSS: -50.00**

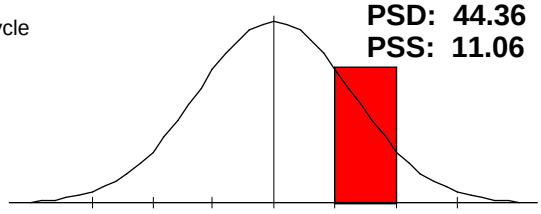


## CAC Cycle Ratios

CA Cycle Phase 1[H], CA Cycle Phase 2, CA Cycle Phase 3, CA Cycle Phase 4[L], CA Cycle Return[L].

This panel reviews cellular energy producing cycles to maintain health and weight. This profile may indicate a heavy toxin load. Consider running additional environmental toxicity tests.

**PSD: 44.36**
**PSS: 11.06**

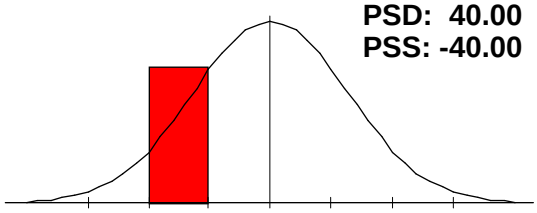


## Carbohydrate Metabolism

Lactate, Pyruvate[L], a-Hydroxybutyrate[L], b-Hydroxybutyrate[L].

This panel assesses your body's ability to metabolize dietary carbohydrates. This profile could indicate a low carbohydrate intake. Symptoms include low energy and poor blood sugar control.

**PSD: 40.00**
**PSS: -40.00**

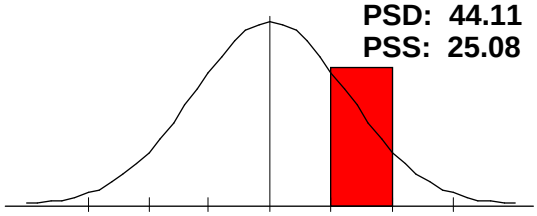


## Energy Production

Citrate[H], cis-Aconitate, Isocitrate, a-Ketoglutarate, Succinate[H], Fumarate[L], Malate[H], Hydroxymethylglutarate[H].

This panel reviews cellular energy producing cycles to maintain health and weight. This profile may indicate a breakdown in the Citric Acid Cycle. Review your Supplement List Explanation.

**PSD: 44.11**
**PSS: 25.08**

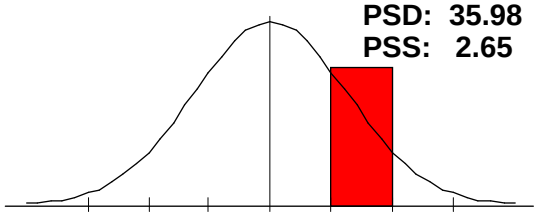


## Fatty Acid Metabolism

Adipate[L], Suberate[H], Ethylmalonate.

This panel assesses how fats are being broken down and utilized by the body. This profile may indicate a need for additional carnitine and riboflavin (B2) supplementation. Review your Supplement List Explanation.

**PSD: 35.98**
**PSS: 2.65**

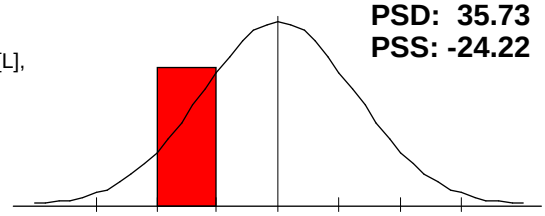


## Intestinal Dysbiosis

p-Hydroxyphenyllactate[H], Phenylacetate[L], Phenylpropionate[L], Tricarballylate[L], DHPP[L], Indican, p-Hydroxybenzoate, D-Lactate[L], D-A.

Disbyosis is an overgrowth of bad bacteria in the gut. It is indicative of gut health. This profile suggests you have good gut health

**PSD: 35.73**
**PSS: -24.22**

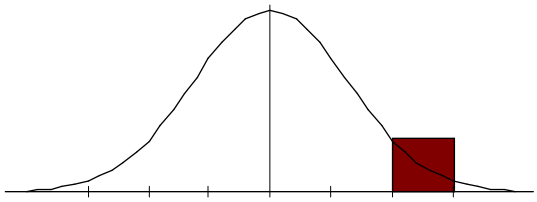


## Liver Detox Indicators

2-Methylhippurate[L], Glucarate[H], Orotate[H], Pyroglutamate, Sulfate[H], a-Hydroxybutyrate[L].

This panel assesses how well your liver removes toxins from your system. This profile may indicate: high environmental toxins, improper regulation of cell growth, hereditary deficiencies, and a depressed ability of the liver to detoxify itself. Consider a detoxification protocol. Review your Supplement List Explanation..

**PSD: 52.10**
**PSS: 26.70**

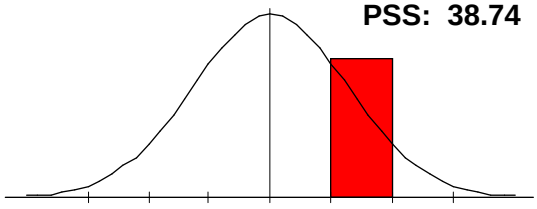


## Neurotransmitters

Vanilmandelate, Homovanillate, 5-Hydroxyindoleacetate[H], Kynurenate[H], Quinolinate.

Neurotransmitters are chemicals the brain uses to make the entire neurological system function - including all body functions. This panel assesses neurotransmitter production. This profile may be caused by the use of SSRI's. This may lead to fatigue, depression, or anxiety.

**PSD: 45.83**
**PSS: 38.74**



Drugs listed below tend to further aggravate elements of blood chemistry that are out of range (H or L). The (#) after each drug denotes the number of times that drug is flagged as being potentially harmful.

| | | | |
|---|---|---|---|
| ACTH | Acetaminophen(4) | Acetazolamide(3) | Acetohexamide(2) |
| Acyclovir(3) | Albuterol(2) | Allopurinol(3) | Amantadine |
| Amitriptyline(3) | Amphotericin B(3) | Ampicillin(3) | Antacids |
| Arginine(2) | Aspirin(7) | Azathioprine(3) | Benziodarone |
| Busulfan(2) | Caffeine | Carbamazepine(5) | Carbenoxolone(2) |
| Carbromal | Carbutamide(2) | Cephaloridine(3) | Chloral hydrate(2) |
| Chlordiazepoxide | Chlorpromazine(4) | Chlorpropamide(3) | Chlorthalidone(5) |
| Clindamycin(2) | Clofibrate(3) | Clonidine(4) | Clopamide(2) |
| Codeine(2) | Colchicine(4) | Colistin | Corticosteroids(3) |
| Cortisol | Cortisone(4) | Cycloserine(3) | Desipramine(2) |
| Dextran(2) | Diazepam(2) | Diazoxide | Diclofenac(3) |
| Diphenylhydantoin | Echinomycin(2) | Erythromycin | Estrogens |
| Ethacrynic Acid(2) | Ethionamide(2) | Fenoprofen(2) | Fluconazole |
| Fluorouracil(2) | Fluphenazine(2) | Flurazepam | Furazolidone(2) |
| Furosemide(5) | G-CSF | Gemfibrozil | Gentamicin(3) |
| Griseofulvin(2) | Guanethidine(2) | Haloperidol(3) | Hydralazine(2) |
| Hydrocortisone(2) | Hydroxyurea(3) | Ibuprofen(5) | Imipramine(4) |
| Indomethacin(4) | Isoproterenol | Itraconazole(2) | Kanamycin(2) |
| Ketocanazole | Ketoprofen | Levodopa(3) | Levonorgestrel(2) |
| Levothyroxine(2) | Lincomycin | Lithium Carbonate(7) | Lovastatin(2) |
| MAO Inhibitors(2) | Melphalen | Mercaptopurine(3) | Methazolamide |
| Methicillin(2) | Methimazole(3) | Methotrexate(4) | Methyldopa(5) |
| Methylthiouracil(2) | Miconazole(2) | Mitoxantrone(2) | Morphine(3) |
| Nafarelin | Naproxen(2) | Neomycin(3) | Nifedipine(2) |
| Nitrofurantoin(4) | Norethisterone | Novobiocin(2) | Ofloxacin(3) |
| Oxazepam | Paraldehyde(2) | Paramethadione(4) | Paromomycin |
| Penicillamine(4) | Penicillin | Phenelzine(2) | Phenobarbital(4) |
| Phenylbutazone(5) | Phenytoin(5) | Piroxicam(3) | Plicamycin(2) |
| Polythiazide(4) | Pravastatin(2) | Prednisone(4) | Probenecid(3) |
| Procainamide(3) | Procarbazine | Progesterone | Progestins |
| Promethazine | Propoxyphene | Propranolol(4) | Propylthiouracil(2) |
| Protriptyline(2) | Prozac | Reserpine(2) | Rifampin(3) |
| Salicylates | Sildenafil(3) | Simvastatin | Spectinomycin(2) |
| Streptokinase | Streptomycin(2) | Sulfamethizole(2) | Sulfamethoxazole(2) |
| Sulfasalazine(2) | Sulfisoxazole(2) | Tadalafil(3) | Tamoxifen(2) |
| Tetracycline(3) | Thiothixene(3) | Tolazamide(2) | Tranylcypromine |
| Triameterene(3) | Trimethadione(4) | Troleandomycin | Valproic Acid |
| Vancomycin | Vardenafil(3) | Vasopressin | Viomycin |

Nutritional and herbal information contained in this report is based upon research related to imbalances in your chemistry. The recommendations are based upon the information provided, without interpretation. This must be done with the help of your qualified health care professional.

| | | ***Rationale*** | |
|---|---|---|---|
| **1-5-HTP** 3x daily 100 mg | **Decreased** | **Normal** | **Increased** |
| 5-Hydroxytryptophan is indicated due to the high level of 5-HIAA in urine which suggests serotonin catabolism and a possible loss of tryptophan reserves. | | | 5-Hydroxyindoleacetate |
| **1-CoEnzyme Q10** 2x daily 100 mg | **Decreased** | **Normal** | **Increased** |
| CoEnzyme Q10 is an essential component of the mitochondria of the energy producing unit of the cell. Its beneficial effects include increased energy, as well as prevention of cardiovascular disease and cancer. Clinical responses may take up to 8 weeks according to some research so patience is necessary during supplementation. | Hydroxymethylglutarate | | Succinate<br>Malate |
| **1-Digestive Enzymes** With meals | **Decreased** | **Normal** | **Increased** |
| Digestive enzymes are helpful in situations where there are signs of allergy, nutrient depletion, improper fat, protein or carbohydrate metabolism. | | | Glucose<br>Triglycerides |
| **1-Folic Acid** 2x daily 800 mcg | **Decreased** | **Normal** | **Increased** |
| Adult: 800 mcg 2x daily Children 800 mcg 1x daily<br>A folic acid deficiency may lead to a buildup of this organic acid which is created through the metabolism of histidine. | | | Formiminoglutamic Acid |
| **1-Oral Electrolyte - Balanced Formula** 2x daily | **Decreased** | **Normal** | **Increased** |
| The main electrolytes in the human body are sodium, potassium, phosphorus, calcium, chloride, magnesium and bicarbonate. During illness, the equilibrium present in healthy individuals, is disturbed. A well balanced formula is helpful in restoring a state of equilibrium. A sports formula will have greater levels of bicarbonate yet still keeping the proportion of the other salts in line. | | Potassium<br>CO2<br>Sodium | |
| **2-Glycine** 2x daily 1000 mg | **Decreased** | **Normal** | **Increased** |
| Glycine is an important amino acid and is necessary in phase II detoxification as it is a component of hippurate through its binding with benzoate. | Benzoate | | Hippurate |
| **H - Garlic** 1 - 3 times daily | **Decreased** | **Normal** | **Increased** |
| Garlic's use has been reported to be beneficial in lowering blood lipid (fat) levels. May cause unwanted bodily odors. As with any herb, caution should be taken with its use. | | | LDL<br>Cholesterol |
| **H - Ginseng (Panax)** 1 - 3 times daily | **Decreased** | **Normal** | **Increased** |
| Also known as Korean Ginseng (Panax ginseng), this herb has shown benefits to those suffering from fatigue, stress, compromised immune systems and diabetes. As with any herb, caution should be taken with its use. Women who experience breast tenderness should discontinue its use. | | | Glucose |
| **H - Milk thistle** 1 - 3 times daily | **Decreased** | **Normal** | **Increased** |
| The herb milk thistle (Silybum marianum) has been reported to be effective in improving liver function. As with all herbs, caution should be taken with its use. Use only under the direction of a health care practitioner if you have chronic liver disease. | | sGOT | sGPT |

This report "MATCHES" clinical observations with the lab test. Elements shown, normal and abnormal, tend to characterize the observation. Highlighted elements are those reported to "MATCH" the characteristics of the clinical observation. Others are NOT matches but are elements in the observation.

## Impaired Ca+ and Zn Transport () 100.00% (2 of 2)

| *Decreased* | *Normal* | *Increased* |
|---|---|---|
| **-50.00 Anserine** | | |
| **-50.00 Carnosine** | | |

## Syndrome X () 100.00% (4 of 4)

| *Decreased* | *Normal* | *Increased* |
|---|---|---|
| **-38.75 HDL-Cholesterol** | | **47.06 Glucose** |
| | | **54.62 Triglycerides** |
| | | **218.33 LDL** |

## Review Cardiovascular Risk Factors () 66.67% (4 of 6)

| *Decreased* | *Normal* | *Increased* |
|---|---|---|
| | -38.75 HDL-Cholesterol | **111.00 Cholesterol** |
| | | **47.06 Glucose** |
| | | **54.62 Triglycerides** |
| | | n/a Uric Acid |
| | | **218.33 LDL** |

Review family history or personal history of cardiovascular risk factors such as smoking, excessive alcohol intake, high fat diet, and/or sedentary lifestyle.

A "+" change is toward optimal % Status of zero. A "-" change is away from optimal % Status of zero.

| Status % on: | 5/19/2015 | | 11/30/2015 | | +/- change |
|---|---|---|---|---|---|
| Arginine | **-73.44** | **L** | -6.47 | | + 66.97 |
| Tryptophan | **56.67** | **H** | 7.50 | | + 49.17 |
| 1-Methylhistidine | **-39.31** | **L** | 4.67 | | + 34.64 |
| a-Aminoadipic Acid | **50.00** | **H** | 16.67 | | + 33.33 |
| Homocystine | **41.67** | **H** | 14.00 | | + 27.67 |
| Hydroxyproline | 18.75 | | **146.30** | **H** | **- 127.55** |
| Cystine | -13.95 | | **56.67** | **H** | **- 42.72** |
| Sarcosine | 8.68 | | **51.25** | **H** | **- 42.57** |
| Glutamine | 8.47 | | **-42.59** | **L** | **- 34.13** |
| a-Amino-N-Butyric Acid | 7.14 | | **-38.00** | **L** | **- 30.86** |
| Lysine | -1.72 | | **-31.82** | **L** | **- 30.09** |
| Carnosine | -20.83 | | **-50.00** | **L** | **- 29.17** |

# Comparison Report

**Anna Salanti** — **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 — Anna Salanti (2718)

The arrow's length is proportional to change. Left to right is increase. Right to left is decrease.
Green is improvement. Red is decline.

| +/- | Status % on: | 5/19/2015 | | 11/30/2015 | |
|---|---|---|---|---|---|
| + | 1-Methylhistidine | **-39.31** | **L** | 4.67 | |
| - | 3-Methylhistidine | **47.30** | **H** | **61.11** | **H** |
| + | a-Aminoadipic Acid | **50.00** | **H** | 16.67 | |
| - | a-Amino-N-Butyric Acid | 7.14 | | **-38.00** | **L** |
| + | Alanine | **30.00** | **H** | 14.10 | |
| | Anserine | **44.44** | **H** | **-50.00** | **L** |
| + | Arginine | **-73.44** | **L** | -6.47 | |
| + | Asparagine | **-59.38** | **L** | **-50.00** | **L** |
| | Aspartic Acid | **-34.31** | **L** | **-41.03** | **L** |
| | b-Alanine | 0.00 | | -1.00 | |
| - | Carnosine | -20.83 | | **-50.00** | **L** |
| | Citrulline | 10.87 | | 9.09 | |
| - | Cystathionine | **33.33** | **H** | **-50.00** | **L** |
| - | Cystine | -13.95 | | **56.67** | **H** |
| | Ethanolamine | 16.67 | | 10.91 | |
| | GABA | **46.67** | **H** | **-50.00** | **L** |
| - | Glutamic Acid | -17.96 | | **-36.92** | **L** |
| - | Glutamine | 8.47 | | **-42.59** | **L** |
| | Glycine | -23.45 | | **-27.14** | **L** |
| + | Histidine | **-38.24** | **L** | -20.00 | |
| + | Homocystine | **41.67** | **H** | 14.00 | |
| - | Hydroxyproline | 18.75 | | **146.30** | **H** |
| + | Isoleucine | -21.43 | | -13.49 | |
| - | Leucine | -8.44 | | -16.67 | |
| - | Lysine | -1.72 | | **-31.82** | **L** |
| | Methionine | -20.59 | | -20.00 | |
| + | Ornithine | **-40.00** | **L** | 16.67 | |
| - | Phenylalanine | 1.72 | | **-26.00** | **L** |
| - | Phosphoethanolamine | -10.87 | | **-32.61** | **L** |
| - | Phosphoserine | **46.00** | **H** | **-58.33** | **L** |
| + | Proline | **-29.38** | **L** | -16.67 | |
| - | Sarcosine | 8.68 | | **51.25** | **H** |
| - | Serine | **-28.46** | **L** | **-48.00** | **L** |
| | Taurine | 10.32 | | -14.35 | |
| + | Threonine | **-59.52** | **L** | **-38.57** | **L** |
| + | Tryptophan | **56.67** | **H** | 7.50 | |
| - | Tyrosine | -7.14 | | **-30.00** | **L** |
| - | Valine | -2.35 | | 16.67 | |
| | **Total Status Deviation** | **27.93** | | **33.44** | |
| | **Total Status Skew** | **0.39** | | **-10.73** | |

# Comparison Progress Report

**Anna Salanti** **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 Anna Salanti (2718)

A "+" change is toward optimal % Status of zero. A "-" change is away from optimal % Status of zero.

| Status % on: | 5/19/2015 | | 11/30/2015 | | +/- change |
|---|---|---|---|---|---|
| Hemoglobin | **147.14** | **H** | -8.33 | | + 138.81 |
| Hematocrit | **150.00** | **H** | -14.55 | | + 135.45 |
| R.B.C. | **93.08** | **H** | **-32.78** | **L** | **+ 60.30** |
| B.U.N. | **71.43** | **H** | **28.95** | **H** | **+ 42.48** |
| Bilirubin, Total | **50.00** | **H** | 10.00 | | + 40.00 |
| CO2 | **-33.33** | **L** | -8.33 | | + 25.00 |
| LDL | **117.65** | **H** | **218.33** | **H** | **- 100.69** |
| Cholesterol | **50.00** | **H** | **111.00** | **H** | **- 61.00** |
| sGPT | -7.14 | | **38.24** | **H** | **- 31.09** |
| Glucose | 17.65 | | **47.06** | **H** | **- 29.41** |
| B.U.N./Creatinine Ratio | **47.27** | **H** | **75.80** | **H** | **- 28.54** |

# Comparison Report

**Anna Salanti** — **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 — Anna Salanti (2718)

The arrow's length is proportional to change. Left to right is increase. Right to left is decrease.
Green is improvement. Red is decline.

| | +/- | Status % on: | 5/19/2015 | | 11/30/2015 | |
|---|---|---|---|---|---|---|
| | | A/G Ratio | 14.29 | | -12.17 | |
| 16.67 ← **34.62** | + | Albumin | **34.62** | **H** | 16.67 | |
| **-31.43** → -10.71 | + | Alkaline Phosphatase | **-31.43** | **L** | -10.71 | |
| -9.00 ← 20.00 | + | Anion Gap | 20.00 | | -9.00 | |
| **28.95** ← **71.43** | + | B.U.N. | **71.43** | **H** | **28.95** | **H** |
| **47.27** → **75.80** | - | B.U.N./Creatinine Ratio | **47.27** | **H** | **75.80** | **H** |
| **-33.33** ← -20.00 | - | Basophils | -20.00 | | **-33.33** | **L** |
| 10.00 ← **50.00** | + | Bilirubin, Total | **50.00** | **H** | 10.00 | |
| | | Calcium | -11.90 | | 18.75 | |
| 4.55 ← 13.64 | + | Chloride | 13.64 | | 4.55 | |
| **50.00** → **111.00** | - | Cholesterol | **50.00** | **H** | **111.00** | **H** |
| **-33.33** → -8.33 | + | CO2 | **-33.33** | **L** | -8.33 | |
| -3.49 ← 23.00 | + | Creatinine | 23.00 | | -3.49 | |
| | | Eosinophils | -7.14 | | -12.86 | |
| -23.33 → -10.00 | + | Globulin | -23.33 | | -10.00 | |
| 17.65 → **47.06** | - | Glucose | 17.65 | | **47.06** | **H** |
| **-38.75** ← -22.00 | - | HDL-Cholesterol | -22.00 | | **-38.75** | **L** |
| -14.55 ← **150.00** | + | Hematocrit | **150.00** | **H** | -14.55 | |
| -8.33 ← **147.14** | + | Hemoglobin | **147.14** | **H** | -8.33 | |
| **117.65** → **218.33** | - | LDL | **117.65** | **H** | **218.33** | **H** |
| **-35.94** ← -24.69 | - | Lymphocytes | -24.69 | | **-35.94** | **L** |
| **28.70** → **42.28** | - | MCH | **28.70** | **H** | **42.28** | **H** |
| | | MCHC | 1.85 | | 1.81 | |
| **35.59** → **47.37** | - | MCV | **35.59** | **H** | **47.37** | **H** |
| 6.67 → 16.67 | - | Monocytes | 6.67 | | 16.67 | |
| 24.12 → **33.53** | - | Neutrophils | 24.12 | | **33.53** | **H** |
| | | Potassium | -20.59 | | -14.71 | |
| -14.00 → 6.00 | + | Protein, Total | -14.00 | | 6.00 | |
| **-32.78** ← **93.08** | + | R.B.C. | **93.08** | **H** | **-32.78** | **L** |
| -10.00 ← -1.43 | - | sGOT | -1.43 | | -10.00 | |
| -7.14 → **38.24** | - | sGPT | -7.14 | | **38.24** | **H** |
| | | Sodium | -20.00 | | -20.00 | |
| **54.62** ← **69.29** | + | Triglycerides | **69.29** | **H** | **54.62** | **H** |
| -20.77 ← 13.08 | - | W.B.C. | 13.08 | | -20.77 | |
| | | **Total Status Deviation** | **34.28** | | **29.28** | |
| | | **Total Status Skew** | **20.08** | | **8.58** | |

# Comparison Progress Report

**Anna Salanti** **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 Anna Salanti (2718)

A "+" change is toward optimal % Status of zero. A "-" change is away from optimal % Status of zero.

| Status % on: | 5/19/2015 | | 11/30/2015 | | +/- change |
|---|---|---|---|---|---|
| Succinate | **207.76** | **H** | **29.31** | **H** | **+ 178.45** |
| p-Hydroxyphenyllactate | **137.18** | **H** | **34.62** | **H** | **+ 102.56** |
| Lactate | **84.37** | **H** | -10.00 | | + 74.37 |
| cis-Aconitate | **50.00** | **H** | -1.52 | | + 48.48 |
| Methylmalonate | **-50.00** | **L** | -20.59 | | + 29.41 |
| a-Ketoglutarate | **-50.00** | **L** | 21.05 | | + 28.95 |
| p-Hydroxybenzoate | **40.91** | **H** | -13.64 | | + 27.27 |
| Quinolinate | **27.50** | **H** | -2.50 | | + 25.00 |
| CA Cycle Phase 1 | **59.80** | **H** | **138.53** | **H** | **- 78.73** |
| Orotate | **-50.00** | **L** | **99.28** | **H** | **- 49.28** |
| Sulfate | **25.09** | **H** | **73.04** | **H** | **- 47.95** |
| Formiminoglutamic Acid | **50.00** | **H** | **91.67** | **H** | **- 41.67** |
| Phenylacetate | 22.73 | | **-50.00** | **L** | **- 27.27** |
| 8-Hydroxy-2-deoxyguan | 4.72 | | **-31.13** | **L** | **- 26.42** |

# Comparison Report

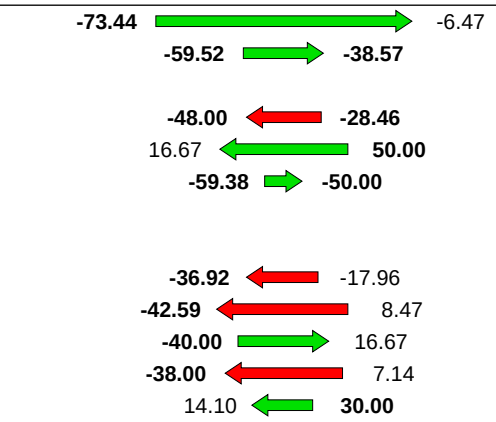
**Anna Salanti** — **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 — Anna Salanti (2718)

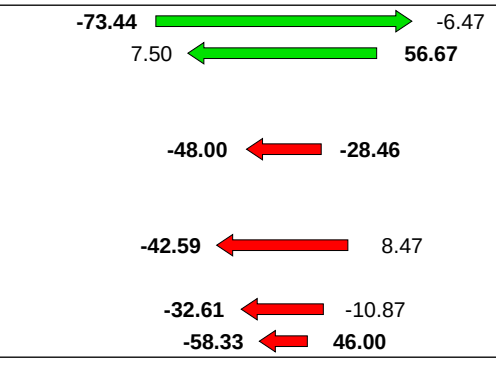
The arrow's length is proportional to change. Left to right is increase. Right to left is decrease.
Green is improvement. Red is decline.

| | +/- | Status % on: | 5/19/2015 | | 11/30/2015 | |
|---|---|---|---|---|---|---|
| **-26.19** ← 15.48 | - | 2-Methylhippurate | 15.48 | | **-26.19** | **L** |
| **161.43** ← **184.29** | + | 5-Hydroxyindoleacetate | **184.29** | **H** | **161.43** | **H** |
| **-31.13** ← 4.72 | - | 8-Hydroxy-2-deoxyguan | 4.72 | | **-31.13** | **L** |
| **-50.00** ← **-33.87** | - | Adipate | **-33.87** | **L** | **-50.00** | **L** |
| | | a-Hydroxybutyrate | **-50.00** | **L** | **-50.00** | **L** |
| | | a-Keto-b-methylvalerate | **-50.00** | **L** | **-50.00** | **L** |
| **-50.00** → 21.05 | + | a-Ketoglutarate | **-50.00** | **L** | 21.05 | |
| | | a-Ketoisocaproate | **-50.00** | **L** | **-50.00** | **L** |
| | | a-Ketoisovalerate | **-50.00** | **L** | **-50.00** | **L** |
| | | Benzoate | **-50.00** | **L** | **-50.00** | **L** |
| | | b-Hydroxybutyrate | **-50.00** | **L** | **-50.00** | **L** |
| 14.47 → **25.00** | - | b-Hydroxyisovalerate | 14.47 | | **25.00** | **H** |
| -1.52 ← **50.00** | + | cis-Aconitate | **50.00** | **H** | -1.52 | |
| **42.48** → **57.34** | - | Citrate | **42.48** | **H** | **57.34** | **H** |
| | | D-Arabinitol | -16.67 | | -16.67 | |
| | | DHPP | **-50.00** | **L** | **-50.00** | **L** |
| **-39.47** ← **-28.95** | - | D-Lactate | **-28.95** | **L** | **-39.47** | **L** |
| 22.22 ← **36.11** | + | Ethylmalonate | **36.11** | **H** | 22.22 | |
| **50.00** → **91.67** | - | Formiminoglutamic Acid | **50.00** | **H** | **91.67** | **H** |
| | | Fumarate | **-50.00** | **L** | **-50.00** | **L** |
| **43.65** → **54.76** | - | Glucarate | **43.65** | **H** | **54.76** | **H** |
| **83.58** → **95.07** | - | Hippurate | **83.58** | **H** | **95.07** | **H** |
| 0.00 ← 10.53 | + | Homovanillate | 10.53 | | 0.00 | |
| **33.33** ← **41.67** | + | Hydroxymethylglutarate | **41.67** | **H** | **33.33** | **H** |
| | | Indican | -10.94 | | 17.19 | |
| -24.58 ← 14.41 | - | Isocitrate | 14.41 | | -24.58 | |
| **50.00** ← **70.00** | + | Kynurenate | **70.00** | **H** | **50.00** | **H** |
| -10.00 ← **84.37** | + | Lactate | **84.37** | **H** | -10.00 | |
| | | Malate | **142.86** | **H** | **135.71** | **H** |
| **-50.00** → -20.59 | + | Methylmalonate | **-50.00** | **L** | -20.59 | |
| **-50.00** → **99.28** | - | Orotate | **-50.00** | **L** | **99.28** | **H** |
| **-50.00** ← 22.73 | - | Phenylacetate | 22.73 | | **-50.00** | **L** |
| | | Phenylpropionate | **-50.00** | **L** | **-50.00** | **L** |
| -13.64 ← **40.91** | + | p-Hydroxybenzoate | **40.91** | **H** | -13.64 | |
| | | P-Hydroxyphenylacetate | -2.63 | | 2.63 | |
| **34.62** ← **137.18** | + | p-Hydroxyphenyllactate | **137.18** | **H** | **34.62** | **H** |
| | | Pyroglutamate | 2.54 | | 9.32 | |
| | | Pyruvate | **-50.00** | **L** | **-50.00** | **L** |
| -2.50 ← **27.50** | + | Quinolinate | **27.50** | **H** | -2.50 | |
| -11.90 → **35.71** | - | Suberate | -11.90 | | **35.71** | **H** |
| **29.31** ← **207.76** | + | Succinate | **207.76** | **H** | **29.31** | **H** |
| **25.09** → **73.04** | - | Sulfate | **25.09** | **H** | **73.04** | **H** |
| | | Tricarballylate | **-50.00** | **L** | **-50.00** | **L** |
| -23.91 → -15.22 | + | Vanilmandelate | -23.91 | | -15.22 | |
| | | Xanthurenate | -20.59 | | -20.59 | |
| | | **Total Status Deviation** | **48.13** | | **42.94** | |
| | | **Total Status Skew** | **8.36** | | **2.72** | |

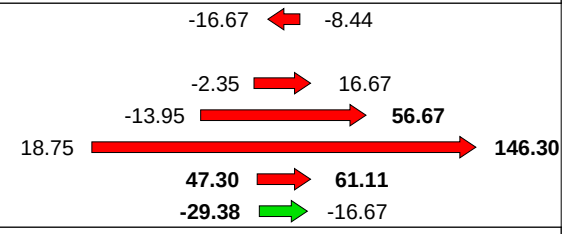
| Ammonia/Energy | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Arginine | **-73.44** | **L** | -6.47 | | + |
| Threonine | **-59.52** | **L** | **-38.57** | **L** | + |
| Glycine | -23.45 | | **-27.14** | **L** | |
| Serine | **-28.46** | **L** | **-48.00** | **L** | - |
| a-Aminoadipic Acid | **50.00** | **H** | 16.67 | | + |
| Asparagine | **-59.38** | **L** | **-50.00** | **L** | + |
| Aspartic Acid | **-34.31** | **L** | **-41.03** | **L** | |
| Citrulline | 10.87 | | 9.09 | | |
| Glutamic Acid | -17.96 | | **-36.92** | **L** | - |
| Glutamine | 8.47 | | **-42.59** | **L** | - |
| Ornithine | **-40.00** | **L** | 16.67 | | + |
| a-Amino-N-Butyric Acid | 7.14 | | **-38.00** | **L** | - |
| Alanine | **30.00** | **H** | 14.10 | | + |
| b-Alanine | 0.00 | | -1.00 | | |
| **PSS / PSD** | -16.43 / 31.64 | | -19.51 / 27.59 | | |




| CNS Metabolism | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Arginine | **-73.44** | **L** | -6.47 | | + |
| Tryptophan | **56.67** | **H** | 7.50 | | + |
| GABA | **46.67** | **H** | **-50.00** | **L** | |
| Glycine | -23.45 | | **-27.14** | **L** | |
| Serine | **-28.46** | **L** | **-48.00** | **L** | - |
| Taurine | 10.32 | | -14.35 | | |
| Aspartic Acid | **-34.31** | **L** | **-41.03** | **L** | |
| Glutamine | 8.47 | | **-42.59** | **L** | - |
| Ethanolamine | 16.67 | | 10.91 | | |
| Phosphoethanolamine | -10.87 | | **-32.61** | **L** | - |
| Phosphoserine | **46.00** | **H** | **-58.33** | **L** | - |
| **PSS / PSD** | 1.30 / 32.30 | | -27.47 / 30.81 | | |

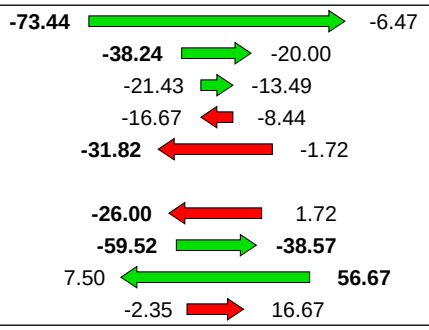



| Connective Tissue | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Leucine | -8.44 | | -16.67 | | - |
| Methionine | -20.59 | | -20.00 | | |
| Valine | -2.35 | | 16.67 | | - |
| Cystine | -13.95 | | **56.67** | **H** | - |
| Hydroxyproline | 18.75 | | **146.30** | **H** | - |
| 3-Methylhistidine | **47.30** | **H** | **61.11** | **H** | - |
| Proline | **-29.38** | **L** | -16.67 | | + |
| **PSS / PSD** | 4.75 / 23.43 | | 32.49 / 47.72 | | |

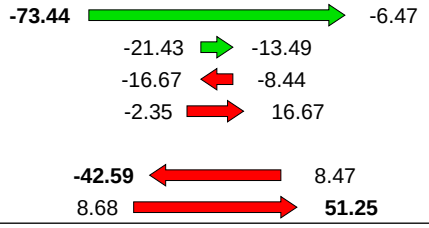



| Detoxification Markers | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Methionine | -20.59 | | -20.00 | | |
| Cystine | -13.95 | | **56.67** | **H** | - |
| Taurine | 10.32 | | -14.35 | | |
| Glutamine | 8.47 | | **-42.59** | **L** | - |
| Glycine | -23.45 | | **-27.14** | **L** | |
| Aspartic Acid | **-34.31** | **L** | **-41.03** | **L** | |
| **PSS / PSD** | -12.25 / 18.51 | | -14.74 / 33.63 | | |

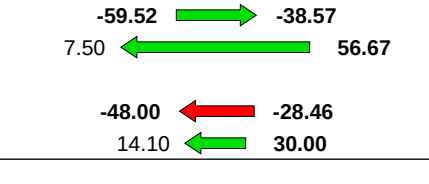
| Essential Amino Acid | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Arginine | **-73.44** | **L** | -6.47 | | + |
| Histidine | **-38.24** | **L** | -20.00 | | + |
| Isoleucine | -21.43 | | -13.49 | | + |
| Leucine | -8.44 | | -16.67 | | - |
| Lysine | -1.72 | | **-31.82** | **L** | - |
| Methionine | -20.59 | | -20.00 | | |
| Phenylalanine | 1.72 | | **-26.00** | **L** | - |
| Threonine | **-59.52** | **L** | **-38.57** | **L** | + |
| Tryptophan | **56.67** | **H** | 7.50 | | + |
| Valine | -2.35 | | 16.67 | | - |
| **PSS / PSD** | -16.73 / 28.41 | | -14.89 / 19.72 | | |



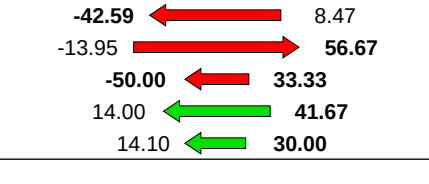

| Fat Metabolism | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Arginine | **-73.44** | **L** | -6.47 | | + |
| Isoleucine | -21.43 | | -13.49 | | + |
| Leucine | -8.44 | | -16.67 | | - |
| Valine | -2.35 | | 16.67 | | - |
| Taurine | 10.32 | | -14.35 | | |
| Glutamine | 8.47 | | **-42.59** | **L** | - |
| Sarcosine | 8.68 | | **51.25** | **H** | - |
| **PSS / PSD** | -11.17 / 19.02 | | -3.66 / 23.07 | | |



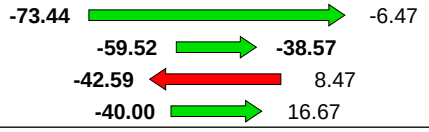

| Gluconeogen | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Threonine | **-59.52** | **L** | **-38.57** | **L** | + |
| Tryptophan | **56.67** | **H** | 7.50 | | + |
| Glycine | -23.45 | | **-27.14** | **L** | |
| Serine | **-28.46** | **L** | **-48.00** | **L** | - |
| Alanine | **30.00** | **H** | 14.10 | | + |
| **PSS / PSD** | -4.95 / 39.62 | | -18.42 / 27.06 | | |




| Hepatic Metabolism | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Methionine | -20.59 | | -20.00 | | |
| Taurine | 10.32 | | -14.35 | | |
| Glutamine | 8.47 | | **-42.59** | **L** | - |
| Cystine | -13.95 | | **56.67** | **H** | - |
| Cystathionine | **33.33** | **H** | **-50.00** | **L** | - |
| Homocystine | **41.67** | **H** | 14.00 | | + |
| Alanine | **30.00** | **H** | 14.10 | | + |
| **PSS / PSD** | 12.75 / 22.62 | | -6.02 / 30.24 | | |




| Immune Metabolites | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Arginine | **-73.44** | **L** | -6.47 | | + |
| Threonine | **-59.52** | **L** | **-38.57** | **L** | + |
| Glutamine | 8.47 | | **-42.59** | **L** | - |
| Ornithine | **-40.00** | **L** | 16.67 | | + |
| **PSS / PSD** | -41.12 / 45.36 | | -17.74 / 26.08 | | |



| Magnesium Dependents | 5/19/2015 | | 11/30/2015 | | +/- | |
|---|---|---|---|---|---|---|
| Citrulline | 10.87 | | 9.09 | | | |
| Ethanolamine | 16.67 | | 10.91 | | | |
| Phosphoethanolamine | -10.87 | | **-32.61** | **L** | - | **-32.61** ← -10.87 |
| Phosphoserine | **46.00** | **H** | **-58.33** | **L** | - | **-58.33** ← **46.00** |
| Serine | **-28.46** | **L** | **-48.00** | **L** | - | **-48.00** ← **-28.46** |
| **PSS / PSD** | 6.84 / 22.57 | | -23.32 / 29.99 | | | |

| Muscle Metabolites | 5/19/2015 | | 11/30/2015 | | +/- | |
|---|---|---|---|---|---|---|
| Anserine | **44.44** | **H** | **-50.00** | **L** | | |
| Carnosine | -20.83 | | **-50.00** | **L** | - | **-50.00** ← -20.83 |
| 1-Methylhistidine | **-39.31** | **L** | 4.67 | | + | **-39.31** → 4.67 |
| 3-Methylhistidine | **47.30** | **H** | **61.11** | **H** | - | **47.30** → **61.11** |
| **PSS / PSD** | 7.90 / 37.97 | | -8.56 / 41.44 | | | |

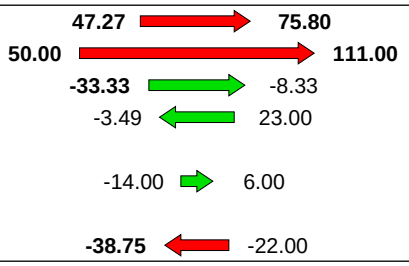
| Neuroendocrine Metab | 5/19/2015 | | 11/30/2015 | | +/- | |
|---|---|---|---|---|---|---|
| GABA | **46.67** | **H** | **-50.00** | **L** | | |
| Glycine | -23.45 | | **-27.14** | **L** | | |
| Serine | **-28.46** | **L** | **-48.00** | **L** | - | **-48.00** ← **-28.46** |
| Taurine | 10.32 | | -14.35 | | | |
| Tyrosine | -7.14 | | **-30.00** | **L** | - | **-30.00** ← -7.14 |
| **PSS / PSD** | -0.41 / 23.21 | | -33.90 / 33.90 | | | |

| Urea Cycle Metabolites | 5/19/2015 | | 11/30/2015 | | +/- | |
|---|---|---|---|---|---|---|
| Arginine | **-73.44** | **L** | -6.47 | | + | **-73.44** → -6.47 |
| Aspartic Acid | **-34.31** | **L** | **-41.03** | **L** | | |
| Citrulline | 10.87 | | 9.09 | | | |
| Ornithine | **-40.00** | **L** | 16.67 | | + | **-40.00** → 16.67 |
| Glutamine | 8.47 | | **-42.59** | **L** | - | **-42.59** ← 8.47 |
| Asparagine | **-59.38** | **L** | **-50.00** | **L** | + | **-59.38** → **-50.00** |
| **PSS / PSD** | -31.30 / 37.74 | | -18.72 / 26.07 | | | |

| Adrenal Function | 5/19/2015 | | 11/30/2015 | | +/- | |
|---|---|---|---|---|---|---|
| Cholesterol | **50.00** | **H** | **111.00** | **H** | - | **50.00** → **111.00** |
| Eosinophils | -7.14 | | -12.86 | | | |
| Eosinophil Count | 10.75 | | -11.65 | | | |
| Potassium | -20.59 | | -14.71 | | | |
| Sodium | -20.00 | | -20.00 | | | |
| Chloride | 13.64 | | 4.55 | | + | 4.55 ← 13.64 |
| **PSS / PSD** | 4.44 / 20.35 | | 9.39 / 29.13 | | | |

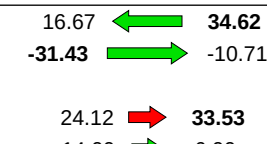
| Allergy | 5/19/2015 | | 11/30/2015 | | +/- | |
|---|---|---|---|---|---|---|
| Eosinophils | -7.14 | | -12.86 | | | |
| Globulin | -23.33 | | -10.00 | | + | -23.33 → -10.00 |
| Lymphocytes | -24.69 | | **-35.94** | **L** | - | **-35.94** ← -24.69 |
| Monocytes | 6.67 | | 16.67 | | - | 6.67 → 16.67 |
| W.B.C. | 13.08 | | -20.77 | | - | -20.77 ← 13.08 |
| **PSS / PSD** | -7.08 / 14.98 | | -12.58 / 19.25 | | | |

| Athletic Potential | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| B.U.N./Creatinine Ratio | **47.27** | **H** | **75.80** | **H** | - |
| Cholesterol | **50.00** | **H** | **111.00** | **H** | - |
| CO2 | **-33.33** | **L** | -8.33 | | + |
| Creatinine | 23.00 | | -3.49 | | + |
| Potassium | -20.59 | | -14.71 | | |
| Protein, Total | -14.00 | | 6.00 | | + |
| Sodium | -20.00 | | -20.00 | | |
| HDL-Cholesterol | -22.00 | | **-38.75** | **L** | - |
| **PSS / PSD** | 1.29 / 28.77 | | 13.44 / 34.76 | | |

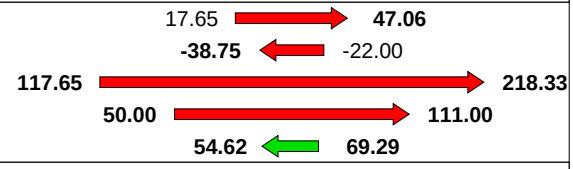



| Biochemical Ratios | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| A/G Ratio | 14.29 | | -12.17 | | |
| B.U.N./Creatinine Ratio | **47.27** | **H** | **75.80** | **H** | - |
| **PSS / PSD** | 26.77 / 26.77 | | 31.82 / 43.99 | | |

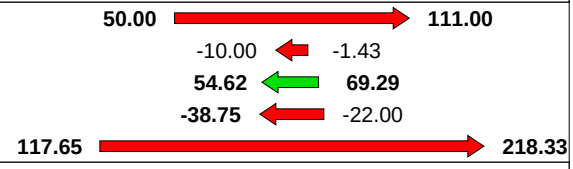

| Bone/Joint | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Albumin | **34.62** | **H** | 16.67 | | + |
| Alkaline Phosphatase | **-31.43** | **L** | -10.71 | | + |
| Calcium | -11.90 | | 18.75 | | |
| Neutrophils | 24.12 | | **33.53** | **H** | - |
| Protein, Total | -14.00 | | 6.00 | | + |
| **PSS / PSD** | 0.28 / 23.21 | | 12.85 / 17.13 | | |



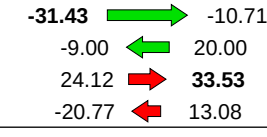

| Carbohydrate Metabolism | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Glucose | 17.65 | | **47.06** | **H** | - |
| HDL-Cholesterol | -22.00 | | **-38.75** | **L** | - |
| LDL | **117.65** | **H** | **218.33** | **H** | - |
| Cholesterol | **50.00** | **H** | **111.00** | **H** | - |
| Triglycerides | **69.29** | **H** | **54.62** | **H** | + |
| **PSS / PSD** | 46.52 / 55.32 | | 78.45 / 93.95 | | |




| Cardiac Risk | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Cholesterol | **50.00** | **H** | **111.00** | **H** | - |
| sGOT | -1.43 | | -10.00 | | - |
| Triglycerides | **69.29** | **H** | **54.62** | **H** | + |
| HDL-Cholesterol | -22.00 | | **-38.75** | **L** | - |
| LDL | **117.65** | **H** | **218.33** | **H** | - |
| **PSS / PSD** | 42.70 / 52.07 | | 67.04 / 86.54 | | |




| Cellular Production | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Alkaline Phosphatase | **-31.43** | **L** | -10.71 | | + |
| Anion Gap | 20.00 | | -9.00 | | + |
| Neutrophils | 24.12 | | **33.53** | **H** | - |
| W.B.C. | 13.08 | | -20.77 | | - |
| **PSS / PSD** | 6.44 / 22.16 | | -1.74 / 18.50 | | |



| Electrolyte Balance | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Calcium | -11.90 | | 18.75 | | |
| Chloride | 13.64 | | 4.55 | | + |
| CO2 | **-33.33** | **L** | -8.33 | | + |
| Potassium | -20.59 | | -14.71 | | |
| Sodium | -20.00 | | -20.00 | | |
| **PSS / PSD** | -14.44 / 19.89 | | -3.95 / 13.27 | | |

| Gastrointest. Function | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Anion Gap | 20.00 | | -9.00 | | + |
| Chloride | 13.64 | | 4.55 | | + |
| Cholesterol | **50.00** | **H** | **111.00** | **H** | - |
| CO2 | **-33.33** | **L** | -8.33 | | + |
| Monocytes | 6.67 | | 16.67 | | - |
| Potassium | -20.59 | | -14.71 | | |
| Sodium | -20.00 | | -20.00 | | |
| Triglycerides | **69.29** | **H** | **54.62** | **H** | + |
| LDL | **117.65** | **H** | **218.33** | **H** | - |
| **PSS / PSD** | 22.59 / 39.02 | | 39.24 / 50.80 | | |

| Hydration | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Albumin | **34.62** | **H** | 16.67 | | + |
| Sodium | -20.00 | | -20.00 | | |
| Potassium | -20.59 | | -14.71 | | |
| Chloride | 13.64 | | 4.55 | | + |
| Calcium | -11.90 | | 18.75 | | |
| CO2 | **-33.33** | **L** | -8.33 | | + |
| Creatinine | 23.00 | | -3.49 | | + |
| B.U.N. | **71.43** | **H** | **28.95** | **H** | + |
| **PSS / PSD** | 7.11 / 28.56 | | 2.80 / 14.43 | | |

| Immune Response | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Basophils | -20.00 | | **-33.33** | **L** | - |
| Eosinophils | -7.14 | | -12.86 | | |
| Lymphocytes | -24.69 | | **-35.94** | **L** | - |
| Monocytes | 6.67 | | 16.67 | | - |
| Neutrophils | 24.12 | | **33.53** | **H** | - |
| Globulin | -23.33 | | -10.00 | | + |
| **PSS / PSD** | -7.40 / 17.66 | | -6.99 / 23.72 | | |

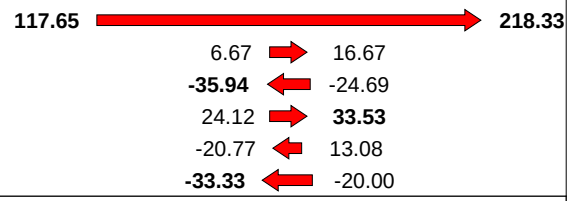
| Immune Response Count | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Basophil Count | **-25.70** | **L** | **-35.25** | **L** | - |
| Eosinophil Count | 10.75 | | -11.65 | | |
| Lymphocyte Count | -21.31 | | **-39.70** | **L** | - |
| Monocyte Count | 20.79 | | 4.44 | | + |
| Neutrophil Count | 8.02 | | -12.74 | | |
| **PSS / PSD** | -1.49 / 17.31 | | -18.98 / 20.76 | | |

# Panel/Subset Comparison Report

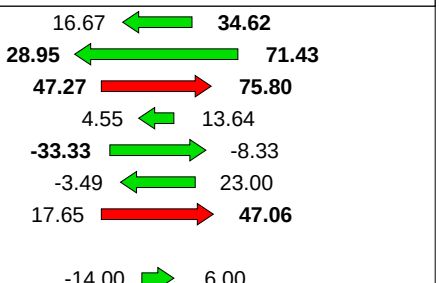
**Anna Salanti** — **Foundational Wellness Profile Date: 11/30/2015**

Female / Age: 63 — Anna Salanti (2718)

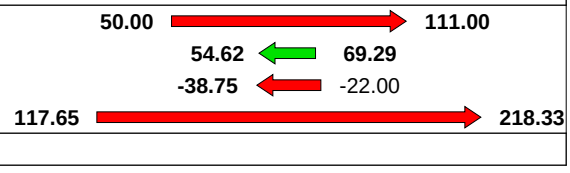
| Inflammatory Process | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Eosinophils | -7.14 | | -12.86 | | |
| LDL | **117.65** | **H** | **218.33** | **H** | - |
| Monocytes | 6.67 | | 16.67 | | - |
| Lymphocytes | -24.69 | | **-35.94** | **L** | - |
| Neutrophils | 24.12 | | **33.53** | **H** | - |
| W.B.C. | 13.08 | | -20.77 | | - |
| Basophils | -20.00 | | **-33.33** | **L** | - |
| **PSS / PSD** | 15.67 / 30.48 | | 23.66 / 53.06 | | |



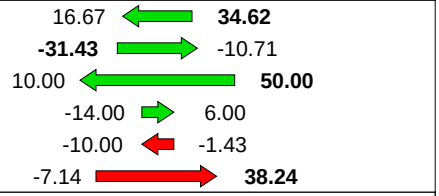

| Kidney Function | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Albumin | **34.62** | **H** | 16.67 | | + |
| B.U.N. | **71.43** | **H** | **28.95** | **H** | + |
| B.U.N./Creatinine Ratio | **47.27** | **H** | **75.80** | **H** | - |
| Chloride | 13.64 | | 4.55 | | + |
| CO2 | **-33.33** | **L** | -8.33 | | + |
| Creatinine | 23.00 | | -3.49 | | + |
| Glucose | 17.65 | | **47.06** | **H** | - |
| Potassium | -20.59 | | -14.71 | | |
| Protein, Total | -14.00 | | 6.00 | | + |
| Sodium | -20.00 | | -20.00 | | |
| **PSS / PSD** | 11.97 / 29.55 | | 13.25 / 22.55 | | |



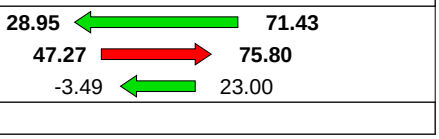

| Lipid | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Cholesterol | **50.00** | **H** | **111.00** | **H** | - |
| Triglycerides | **69.29** | **H** | **54.62** | **H** | + |
| HDL-Cholesterol | -22.00 | | **-38.75** | **L** | - |
| LDL | **117.65** | **H** | **218.33** | **H** | - |
| **PSS / PSD** | 53.73 / 64.73 | | 86.30 / 105.67 | | |




| Liver Function | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Albumin | **34.62** | **H** | 16.67 | | + |
| Alkaline Phosphatase | **-31.43** | **L** | -10.71 | | + |
| Bilirubin, Total | **50.00** | **H** | 10.00 | | + |
| Protein, Total | -14.00 | | 6.00 | | + |
| sGOT | -1.43 | | -10.00 | | - |
| sGPT | -7.14 | | **38.24** | **H** | - |
| **PSS / PSD** | 5.10 / 23.10 | | 8.36 / 15.27 | | |




| Nitrogen | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| B.U.N. | **71.43** | **H** | **28.95** | **H** | + |
| B.U.N./Creatinine Ratio | **47.27** | **H** | **75.80** | **H** | - |
| Creatinine | 23.00 | | -3.49 | | + |
| **PSS / PSD** | 47.23 / 47.23 | | 33.75 / 36.08 | | |



| Oxidative Stress | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Anion Gap | 20.00 | | -9.00 | | + |
| Bilirubin, Total | **50.00** | H | 10.00 | | + |
| Chloride | 13.64 | | 4.55 | | + |
| Cholesterol | **50.00** | H | **111.00** | H | - |
| Glucose | 17.65 | | **47.06** | H | - |
| **PSS / PSD** | 30.26 / 30.26 | | 32.72 / 36.32 | | |

| Protein | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| A/G Ratio | 14.29 | | -12.17 | | |
| Albumin | **34.62** | H | 16.67 | | + |
| Globulin | -23.33 | | -10.00 | | + |
| Protein, Total | -14.00 | | 6.00 | | + |
| **PSS / PSD** | 2.89 / 21.56 | | 0.12 / 11.21 | | |

| Pulmonary Function | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Anion Gap | 20.00 | | -9.00 | | + |
| Calcium | -11.90 | | 18.75 | | |
| CO2 | **-33.33** | L | -8.33 | | + |
| Potassium | -20.59 | | -14.71 | | |
| sGOT | -1.43 | | -10.00 | | - |
| Sodium | -20.00 | | -20.00 | | |
| **PSS / PSD** | -11.21 / 17.88 | | -7.21 / 13.46 | | |

| Red Blood Cell Health | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Hematocrit | **150.00** | H | -14.55 | | + |
| Hemoglobin | **147.14** | H | -8.33 | | + |
| MCH | **28.70** | H | **42.28** | H | - |
| MCHC | 1.85 | | 1.81 | | |
| MCV | **35.59** | H | **47.37** | H | - |
| R.B.C. | **93.08** | H | **-32.78** | L | + |
| W.B.C. | 13.08 | | -20.77 | | - |
| **PSS / PSD** | 67.06 / 67.06 | | 2.15 / 23.98 | | |

| B-Complex Markers | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| b-Hydroxyisovalerate | 14.47 | | **25.00** | H | - |
| a-Ketoisovalerate | **-50.00** | L | **-50.00** | L | |
| a-Ketoisocaproate | **-50.00** | L | **-50.00** | L | |
| a-Keto-b-methylvalerate | **-50.00** | L | **-50.00** | L | |
| Methylmalonate | **-50.00** | L | -20.59 | | + |
| Formiminoglutamic Acid | **50.00** | H | **91.67** | H | - |
| Xanthurenate | -20.59 | | -20.59 | | |
| **PSS / PSD** | -22.30 / 40.72 | | -10.64 / 43.98 | | |

| BCAA Catabolism | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| a-Ketoisovalerate | **-50.00** | L | **-50.00** | L | |
| a-Ketoisocaproate | **-50.00** | L | **-50.00** | L | |
| a-Keto-b-methylvalerate | **-50.00** | L | **-50.00** | L | |
| **PSS / PSD** | -50.00 / 50.00 | | -50.00 / 50.00 | | |

| CAC Cycle Ratios | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| CA Cycle Phase 1 | **59.80** | H | **138.53** | H | - |
| CA Cycle Phase 2 | -12.25 | | -10.29 | | |
| CA Cycle Return | **-43.22** | L | **-40.00** | L | |
| **PSS / PSD** | 1.44 / 38.43 | | 11.06 / 44.36 | | |

| Carbohydrate Metabolism | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Lactate | **84.37** | H | -10.00 | | + |
| Pyruvate | **-50.00** | L | **-50.00** | L | |
| a-Hydroxybutyrate | **-50.00** | L | **-50.00** | L | |
| b-Hydroxybutyrate | **-50.00** | L | **-50.00** | L | |
| **PSS / PSD** | -16.41 / 58.59 | | -40.00 / 40.00 | | |

| Energy Production | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Citrate | **42.48** | H | **57.34** | H | - |
| cis-Aconitate | **50.00** | H | -1.52 | | + |
| Isocitrate | 14.41 | | -24.58 | | - |
| a-Ketoglutarate | **-50.00** | L | 21.05 | | + |
| Succinate | **207.76** | H | **29.31** | H | + |
| Fumarate | **-50.00** | L | **-50.00** | L | |
| Malate | **142.86** | H | **135.71** | H | |
| Hydroxymethylglutarate | **41.67** | H | **33.33** | H | + |
| **PSS / PSD** | 49.90 / 74.90 | | 25.08 / 44.11 | | |

| Fatty Acid Metabolism | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| Adipate | **-33.87** | L | **-50.00** | L | - |
| Suberate | -11.90 | | **35.71** | H | - |
| Ethylmalonate | **36.11** | H | 22.22 | | + |
| **PSS / PSD** | -3.22 / 27.30 | | 2.65 / 35.98 | | |

| Intestinal Dysbiosis | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| p-Hydroxyphenyllactate | **137.18** | H | **34.62** | H | + |
| Phenylacetate | 22.73 | | **-50.00** | L | - |
| Phenylpropionate | **-50.00** | L | **-50.00** | L | |
| Tricarballylate | **-50.00** | L | **-50.00** | L | |
| DHPP | **-50.00** | L | **-50.00** | L | |
| Indican | -10.94 | | 17.19 | | |
| p-Hydroxybenzoate | **40.91** | H | -13.64 | | + |
| D-Lactate | **-28.95** | L | **-39.47** | L | - |
| D-Arabinitol | -16.67 | | -16.67 | | |
| **PSS / PSD** | -0.64 / 45.26 | | -24.22 / 35.73 | | |

| Liver Detox Indicators | 5/19/2015 | | 11/30/2015 | | +/- |
|---|---|---|---|---|---|
| 2-Methylhippurate | 15.48 | | **-26.19** | L | - |
| Glucarate | **43.65** | H | **54.76** | H | - |
| Orotate | **-50.00** | L | **99.28** | H | - |
| Pyroglutamate | 2.54 | | 9.32 | | |
| Sulfate | **25.09** | H | **73.04** | H | - |
| a-Hydroxybutyrate | **-50.00** | L | **-50.00** | L | |
| **PSS / PSD** | -2.21 / 31.13 | | 26.70 / 52.10 | | |

| Neurotransmitters | 5/19/2015 | | 11/30/2015 | | +/- | |
|---|---|---|---|---|---|---|
| Vanilmandelate | -23.91 | | -15.22 | | + | -23.91 → -15.22 |
| Homovanillate | 10.53 | | 0.00 | | + | 0.00 ← 10.53 |
| 5-Hydroxyindoleacetate | **184.29** | **H** | **161.43** | **H** | + | **161.43** ← **184.29** |
| Kynurenate | **70.00** | **H** | **50.00** | **H** | + | **50.00** ← **70.00** |
| Quinolinate | **27.50** | **H** | -2.50 | | + | -2.50 ← **27.50** |
| **PSS / PSD** | 53.68 / 63.25 | | 38.74 / 45.83 | | | |

**Village Pharmacy**
898 Tanager Street
Incline Village, NV 89451
Tel: (775) 831-1133
Fax: (775) 831-2228

# *Custom Amino Acid Profile*

Biochemically Individualized for your patient

Ordering Practitioner
**Anna Salanti**
503-977-2660

Client
**Anna Salanti**

Visit date
**11/30/2015**

## *Order Payment and Delivery Information*

To order, complete and FAX to (775) 831-2228.

**Ship to:** _____

**Address:** _____

**City, State, Zip:** _____

**Phone:** _____

***Credit Card Number:*** _____ ***Expires:*** _____

***Authorizing Signature:*** _____

## *Amino Acid Customization Details*

| | Container Base Grams | Test Result | % Status | Grams Added |
|---|---|---|---|---|
| L-Arginine | 19.50 | 8.199999 | -6.47 | 0 |
| L-Histidine | 13.50 | 6.5 | -20.00 | 0 |
| L-Isoleucine | 13.50 | 6 | -13.49 | 0 |
| L-Leucine | 12.00 | 11 | -16.67 | 0 |
| L-Lysine | 12.00 | 17 | -31.82 | 0 |
| L-Methionine | 15.00 | 2.200000 | -20.00 | 0 |
| L-Phenylalanine | 15.00 | 5.199999 | -26.00 | 0 |
| L-Taurine | 8.10 | 8.600000 | -14.35 | 0 |
| L-Threonine | 13.50 | 9.600000 | -38.57 | 0 |
| L-Tryptophan (as 5-HTP) | 0.90 | 5.300000 | 7.50 | 0 |
| L-Valine | 15.00 | 25 | 16.67 | 0 |
| Total Base Grams: | **138.00** | Total Grams Added: | | **0** |

***Other Ingredients ****

| | Grams per Container |
|---|---|
| Alanine | 26.88 |
| Alpha-Ketoglutarate | 12.00 |
| Aspartic Acid | 11.04 |
| Glycine | 67.92 |
| Glutamic Acid | 16.98 |
| Glutamine | 7.50 |
| Proline | 30.96 |
| Serine | 8.76 |
| Tyrosine | 0.36 |
| Magnesium | 2.01 |
| P5P (B6) | 1.005 |
| Folic Acid | 0.67 |
| Zinc | 0.67 |

* Flavored product may include additional ingredients not shown.

*Customization exclusively from Lab Interpretation's LabAssist™ interpretive report, and KTS Products Synerplex Amino Acids.*