## Self-Scoring

## I.Q. Test Measure Your Mental Ability



## Intelligence Test for All Age Groups

## IMPORTANT! Read These Instructions First

This test has been carefully designed to measure the general intelligence level of both adults and children 9 years old and older. If you follow the instructions below, the test will give you an accurate rating of your I.Q.

## A. INSTRUCTIONS

1) You have 45 minutes to answer the 60 questions. Do not exceed this time limit.
2) Answer all questions. If you do not know the answer, guess. Guessing has been considered in the scoring. Do not leave any questions unanswered.
3) If a question seems to have more than one answer or no correct answer at all, pick what you consider to be the best of the choices given. These questions are purposely designed to test your ability to think and reason.
4) If a child is talking the test, the parent should make certain the child understands the instructions and sample questions before he begins. If the child is a very poor reader, the parent may read the test questions to him, but he must not help him in any way with the answers. If the child is given any help, the test score will not reflect an accurate I.Q. [This should also be considered for those for whom English is a second language.]

## B. SAMPLE QUESTIONS

Carefully study the following sample questions before beginning the test.
I. In some questions you will be asked to make a comparison.

Example: Which one of the five makes the best comparison?
Boat is to water as airplane is to:
SUN GROUND WATER SKY TREE
The answer is sky. A boat travels through water. This can be compared to an airplane that travels through the sky.

You will also be asked to compare designs.
Example: Which one of the five makes the best comparison?

(A)

(B)

(C) $\square$
(D)

(E)


The answer is C. A circle that is divided into two parts can be compared to a square that is also divided into two parts.
II. In some questions you will be given a group of five things. Four of them will have something in common; they will be similar in some way. You will be asked to choose the one that is not similar to the other four.

Example: Which one of the five is least like the other four?

$$
\text { DOG } \quad \text { CAR } \quad \text { CAT } \quad \text { BIRD } \quad \text { FISH }
$$

The answer is car. The others are all living animals. A car is not alive.

These questions may also have designs.
Example: Which one of the five is least like the other four?
(A)

(B)

(C) $\square$
(D)

(E)


The answer is D . The others are all made with straight lines. A circle is a curved line.
III. In some questions you will be given numbers or letters that are in a certain order. They follow some pattern of arrangement. However, one of them will not fit. You will be asked to choose the one that does not fit into the pattern.

Example: Which one of the numbers does not belong in the following series?

$$
1-3-5-7-9-10-11-13
$$

The answer is 10 . Starting with 1 , the odd numbers are arranged in order, 10 is an even number that does not fit in the series.
IV. There will also be some problems that you will be asked to solve. These will not require any difficult math. Instead, they will be testing how logical you are - that is, how well do you think.

You are now ready to begin the test. Read each question carefully and write your answer in the column to the right of the question. You have 45 minutes.

Editor's Note: This test is based on Self-Scoring I.Q. Test Intelligence Test for Adults and Children, © 1977, by Alfred W. Munzert. All right reserved under International, Pan American and Universal Copyright Conventions. H/U Publications, 155 East 3300 South, Salt Lake City, Utah, 84115. ISBN 0-917292-00-6. This reproduction is fair use for educational purposes only, not for resale.

- NECX Education Inmate Tutor Garry Johnson, Instructor Teri Angel.

| 1 | Which one of the five is least like the other four? |  |  | Answers |
| :---: | :---: | :---: | :---: | :---: |
|  | BEAR SNAKE COW | DOG | TIGER |  |
| 2 | If you rearrange the letters "BARBIT," you would have the name of a(n): |  |  |  |
| 3 | Which one of the five designs makes the best comparison? <br> is to $\square$ as is to: |  |  |  |
| 4 | Which one of the five is least like the other four? <br> POTATO <br> CORN <br> APPLE | CARROT | BEAN |  |
| 5 | Which one of the five designs makes the best comparison? $\begin{aligned} \therefore \\ \ddots \end{aligned}$ <br> is to $\square$ as $\square$ is to: <br> (A) <br> (B) <br> (C) | (D) $\square$ | (E) |  |
| 6 | John, twelve years old, is three times as old as his brother. How old will John be when he is twice as old as his brother? |  |  |  |
| 7 | Which one of the five makes the best comparison? <br> Brother is to sister as niece is to: |  |  |  |
| 8 | Which one of the five designs is least like the other four? <br> A <br> Z <br> F | N | $E$ |  |
| 9 | Which one of the five makes the best comparison? <br> Milk is to glass as letter is to: |  |  |  |
| 10 | Which one of the five designs is least like the other four? <br> (A) <br> (B) <br> (C) | (D) $\Delta$ | (E) |  |
| 11 | Which one of the five choices makes the best comparison? <br> LIVE is to EVIL as 5232 is to: |  |  |  |
| 12 | "If some Smaugs are Thors and some Thors are Thrains, then some Smaugs are definitely Thrains." <br> This statement is: |  |  |  |
| 13 | Which one of the five designs is least like the other four? <br> (A) <br> (B) <br> (C) | (D) | (E) |  |



| 26 | Which one of the letters does not belong in the following series: $\mathrm{A}-\mathrm{D}-\mathrm{G}-\mathrm{I}-\mathrm{J}-\mathrm{M}-\mathrm{P}-\mathrm{S}$ | Answers |
| :---: | :---: | :---: |
|  | D I |  |
| 27 | Which one of the five designs makes the best comparison? <br> is to $\square$ $\square$ $\theta$ as is to: <br> (A) <br> (B) <br> (C) <br> (D) <br> (E) |  |
| 28 | The price of an article was cut $20 \%$ for a sale. <br> By what percent must the item be increased to again sell the article at the original price? $\begin{array}{ccccc} 15 \% & 20 \% & 25 \% & 30 \% & 40 \% \end{array}$ |  |
| 29 | Which one of the five is least like the other four? |  |
| 30 | Which one of the five designs makes the best comparison? <br> $\Delta \Delta$ is to /// as $\square_{\square}^{\square} \square_{\square}^{\square}$ is to: <br> (A) ${ }^{\mathrm{O}} \mathrm{O}$ <br> (B) $\left.\begin{array}{c}00 \\ 00\end{array}\right]$ <br> (C) 000 <br> (D) 00 <br> (E) $\mathrm{O}_{\mathrm{O}}^{\mathrm{O}} \mathrm{O}$ |  |
| 31 | Which one of the five is least like the other four? <br> BOTTLE CUP TUB FUNNEL BOWL |  |
| 32 | Mary had a number of cookies. After eating one, she gave half the remainder to her sister. After eating another cookie, she gave half of what was left to her brother. Mary now had only five cookies left. How many cookies did she start with? |  |
| 33 | Which one of the five is least like the other four? <br> WHEAT <br> HAY <br> BARLEY <br> OATS <br> RICE |  |
| 34 | Which one of the numbers does not belong in the following series? $2-3-6-7-8-14-15-30$ |  |
| 35 | Which one of the five designs makes the best comparison? <br> $<$ is to <br> as $\square$ is to: <br> (A) $\square$ (B) <br> (C) $\square$ (D) $\square$ (E) $\square$ $\square$ |  |
| 36 | "A spaceship received three messages in a strange language from a distant planet. The astronauts studied these messages and found out that "Elros Aldarion Elendil" means "Danger Rocket Explosion" and "Edain Minyatur Elros" means "Danger Spaceship Fire" and "Aldarion Gimilzor Gondor" means "Bad Gas Explosion." <br> What does "Elendil" mean? <br> DANGER EXPLOSION NOTHING ROCKET GAS |  |


|  | Which one of the five is least like the other four? | Answers |
| :---: | :---: | :---: |
| 37 | (A) <br> 16 <br> (B) <br> (C) <br> $\bigcirc$ <br> (D) <br> (E) |  |
| 38 | Which one of the five makes the best comparison? <br> Belt is to buckle as shoe is to: <br> SOCK TOE FOOT LACE SOLE |  |
| 39 | Which one of the five designs is least like the other four? <br> (A) <br> (B) <br> $A$ <br> (C) <br> (D) <br> (E) |  |
| 40 | John received $\$ .41$ change from a purchase in the drugstore. <br> If he received six coins, three of the coins had to be: <br> PENNIES NICKLES DIMES QUARTERS HALF-DOLLARS |  |
| 41 | Which one of the five designs is least like the other four? <br> (A) <br> (B) <br> (C) <br> (D) <br> (E) |  |
| 42 | If you rearrange the letters "MANGERY," you would have the name of a(n): <br> OCEAN <br> COUNTRY <br> STATE <br> CITY <br> ANIMAL |  |
| 43 | Which one of the designs makes the best comparison? <br> is to as $\qquad$ is to: <br> (A) <br> (B) <br> (C) <br> (D) <br> (E) |  |
| 44 | "If all Wargs are Twerps and no Twerps are Gollums, then no Gollums are definitely Wargs." This statement is: <br> NEITHER |  |
| 45 | Which one of the five is least like the other four? <br> HORSE KANGAROO ZEBRA DEER DONKEY |  |
| 46 | Which one of the designs does not belong in the following series? <br> (A) <br> (B) <br> $\begin{array}{ll}\text { E } & \text { F } \\ H & 6\end{array}$ <br> (C) <br> 1 1 <br> 1  <br> (D) <br> $\begin{array}{ll}\mathrm{M} & \mathrm{N} \\ \mathrm{O} & \mathrm{p}\end{array}$ <br> (E) <br> $Q$ $R$ <br> $T$ $s$ |  |
| 47 | Which one of the five makes the best comparison? <br> Finger is to hand as leaf is to: <br> TREE BRANCH BLOSSOM TWIG BARK |  |
| 48 | "John's mother sent him to the store to get 9 large cans of peaches. John could only carry 2 cans at a time. How many trips to the store did John have to make?" <br> 4 <br> $41 / 2$ <br> 5 <br> 51/2 <br> 6 |  |
| 49 | Which one of the five designs is least like the other four? <br> (A) <br> (B) <br> $\gg$ <br> (C) <br> (D) <br> (E) <br> $\longrightarrow$ |  |


| 50 | Which one of the five makes the best comparison? Foot is to knee as hand is to: |  |  |  |  | Answers |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | FINGER | ELBOW | TOE | LEG | ARM |  |
| 51 | Which one of the <br> (A) | igns is least <br> (B) | he other four? <br> (C) | (D) |  |  |
| 52 | Mary was both 13th highest and 13th lowest in a spelling contest. How many people were in the contest? |  |  |  |  |  |
| 53 | Which one of the five makes the best comparison? Water is to ice as milk is to: |  |  |  |  |  |
| 54 | Which one of the numbers does not belong in the following series?$1-2-5-10-13-26-29-48$ |  |  |  |  |  |
| 55 | Which one of the <br> HAM | east like th LIVER | four? <br> SALMON | PORK | BEEF |  |
| 56 | "If all Fleeps are Sloops and all Sloops are Loopies, then all Fleeps are definitely Loopies." This statement is: |  |  |  |  |  |
| 57 | Which one of the <br> is <br> (A) 0 | igns make <br> as <br> (B) | st compariso <br> (C) $\square$ $\circ$ | (D) | (E) $\square$ $\square$ , |  |
| 58 | Which one of the <br> INCH | least like th MILE | four? <br> ACRE | YARD | FOOT |  |
| 59 | Which one of the $\square$ is <br> (A) |  | st compariso <br> (C) | (D) | (E) $\square$ |  |
| 60 | "A fish has a head 9 " long. The tail is equal to the size of the head plus one-half the size of the body. The body is the size of the head plus the tail." <br> How long is the fish? |  |  |  |  |  |


| 1. | SNAKE | All the others have legs; all the others are mammals. |
| :---: | :---: | :---: |
| 2. | ANIMAL | "BARBIT" = RABBIT |
| 3. | D | The triangles and squares change place, and the vertical figures become horizontal. |
| 4. | APPLE | The others are vegetables. |
| 5. | B | Since this is a reverse comparison, the solid line triangle is the reverse of the broken line square. |
| 6. | 16 | John's brother is 4 . In 4 years the brother will be 8, and John will be 16 or twice as old. |
| 7. | NEPHEW | Brother and sister, and niece and nephew are all opposites. |
| 8. | E | All the others are made with only 3 lines; $E$ is made with 4 lines. |
| 9. | ENVELOPE | Milk goes into a glass, just as a letter goes into an envelope. |
| 10. | E | The large circle has a smaller figure of itself inside; the others have different figures inside. |
| 11. | C | EVIL is the reverse spelling of LIVE; the reverse of 5232 is 2325 . |
| 12. | FALSE | Example: "If some cats are animals and some animals are dogs, then some cats are definitely dogs." We cannot make this assumption definitely. |
| 13. | D | It is the only one made with circles. |
| 14. | HOUSE | A tree comes up out of the ground, just as a chimney comes up out of a house. |
| 15. | THREE | The order is "minus 2 , plus 1 , minus 2 , plus 1 ," etc. Three violates this order. |
| 16. | SMILE | The others are senses; smile is a facial expression. |
| 17. | B | The first two designs point in the same direction, just as the triangle and figure $B$ point in the same direction. |
| 18. | D | Without more information it is impossible to tell. We only know that both Peter and Bill are shorter than Jack. |
| 19. | PURSE | The others are all articles of clothing that are worn. |
| 20. | D | Substitute numbers for letters; $\mathrm{C}=3$ and $\mathrm{A}=1$. |
| 21. | CITY | "RAPIS" = PARIS |
| 22. | B | It is not made with straight lines. |
| 23. | CANNON | A bullet is fired from a gun, and a ball is fired from a cannon. The others do not involve an explosive force. |
| 24. | FALSE | Example: "If some cars are green and all leaves are green, then some cars are definitely leaves." We cannot make this assumption definitely. |
| 25. | B | The numbers indicate the position of the letters in the alphabet. E is the 5th letter in the alphabet, not the 6th. |
| 26. | I | The order is "A, skip 2 letters, D, skip 2 letters, G," etc. I violates this order. |
| 27. | D | The geometric figures are reversed, and the position of the crosses and arrows either inside or outside the figures is reversed. |
| 28. | 25\% | Example: A $\$ 1.00$ item reduced $20 \%$ will sell for $80 \phi$. To sell it at $\$ 1.00$ again, you must increase the price $20 \phi$. $20 \phi$ is $25 \%$ of $80 \phi$. |
| 29. | BRASS | The others are simple metals; brass is an alloy (a combination of two metals - copper and zinc). |
| 30. | E | Three figures change into 3 different figures, and 5 figures change into 5 different figures. |


| 31. | FUNNEL | The others hold liquids; liquids pass through a funnel. |
| :---: | :---: | :---: |
| 32. | 23 | $23-1=22$. Half of 22 is $11.11-1=10$. Half of 10 is 5 , the number of cookies Mary had left. |
| 33. | HAY | The others are grains; hay is a grass. |
| 34. | EIGHT | The order is "plus 1 , times 2 , plus 1 , times 2 ," etc. Eight violates this order. |
| 35. | B | The designs are reversed, and one side is removed from the smaller figure. |
| 36. | ROCKET | Elros $=$ Danger, Aldarion $=$ Explosion, therefore Elendil must mean Rocket. |
| 37. | B | All other object begin with the letter " S "; knife begins with the letter "K." |
| 38. | LACE | You buckle a belt, just as you lace your shoes. |
| 39. | D | It is divided into four parts; the others are divided into three parts. |
| 40. | DIMES | Three dimes, 2 nickles, and 1 penny is the only possible solution. |
| 41. | D | The other figures are divided into the same number of triangles as the number of sides the figure has. |
| 42. | COUNTRY | "MANGERY" = GERMANY |
| 43. | E | A hand goes into a mitten, just as a foot goes into a shoe. |
| 44. | TRUE | Example: "If all dogs are animals and no animals are plants, then no plants are definitely dogs." We can definitely make this assumption. |
| 45. | KANGAROO | The others walk on four legs. |
| 46. | D | The letters in the other squares all move in order in a clockwise direction. |
| 47. | TWIG | Finger is an appendage of the hand, just as a leaf is an appendage of a twig. |
| 48. | 5 | Nine divided by $2=4 \frac{1}{2}$, but it takes 5 trips even though John will only get one can on one of the trips. |
| 49. | E | It does not have a twin. |
| 50. | ELBOW | Foot is attached to leg, and knee is a joint in the leg. Hand is attached to arm, and elbow is a joint in the arm. |
| 51. | D | It has 2 black stripes; the others have 1. |
| 52. | 25 | There are 12 students lower and 12 students higher, plus Mary is 25 . |
| 53. | CHEESE | Water changes into ice, and milk changes into cheese. |
| 54. | FORTY-EIGHT | The order is "times 2 , plus 3 , times 2 , plus 3 ," etc. Forty-eight violates the order. |
| 55. | SALMON | The others are red meat; salmon is a fish. |
| 56. | TRUE | Example: "If all dogs are mammals, and all mammals are animals, then all dogs are definitely animals." We can definitely make this assumption. |
| 57. | E | Circles change into squares, and the shading is reversed. |
| 58. | ACRE | Acre measures area; the others measure distance. |
| 59. | C | The 4 sided square is divided into 4 squares, just as the 3 sided triangle is divided into 3 triangles. |
| 60. | 72" | The head is $9^{\prime \prime}$. The tail is $18^{\prime \prime}+9^{\prime \prime}=27^{\prime \prime}$. The body is $9 \prime \prime+18^{\prime \prime}+9^{\prime \prime}=36 \prime .9^{\prime \prime}+27^{\prime \prime}+36^{\prime \prime}=72^{\prime \prime}$. This may be solved algebraically as well. |

From the answer sheet on previous page determine how many correct answers you had. Locate the number in the correct
age column ( $16+$ Adult) then directly to the right in the last column (I.Q. column), you will locate your I.Q. rating.

| Age | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 + Adult | I.Q. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 9 | 10 | 11 | 13 | 16 | 18 | 20 | 22 | 80 |
|  | 10 | 11 | 12 | 14 | 17 | 19 | 21 | 23 | 82 |
|  | 11 | 12 | 13 | 15 | 18 | 20 | 22 | 24 | 84 |
|  | 12 | 13 | 14 | 16 | 19 | 21 | 23 | 25 | 86 |
|  | 13 | 14 | 15 | 17 | 20 | 22 | 24 | 26 | 88 |
|  | 14 | 15 | 16 | 18 | 21 | 23 | 25 | 27 | 90 |
|  | 15 | 16 | 17 | 19 | 22 | 24 | 26 | 28 | 92 |
|  | 16 | 17 | 18 | 20 | 23 | 25 | 27 | 29 | 94 |
|  | 17 | 18 | 19 | 21 | 24 | 26 | 28 | 30 | 96 |
|  | 18 | 19 | 20 | 22 | 25 | 27 | 29 | 31 | 98 |
|  | 19 | 20 | 21 | 23 | 26 | 28 | 30 | 32 | 100 |
|  | 20 | 21 | 22 | 24 | 27 | 29 | 31 | 33 | 102 |
|  | 21 | 22 | 23 | 25 | 28 | 30 | 32 | 34 | 104 |
|  | 22 | 23 | 24 | 26 | 29 | 31 | 33 | 35 | 106 |
|  | 23 | 24 | 25 | 27 | 30 | 32 | 34 | 36 | 108 |
|  | 24 | 25 | 26 | 28 | 31 | 33 | 35 | 37 | 110 |
|  | 25 | 26 | 27 | 29 | 32 | 34 | 36 | 38 | 112 |
|  | 26 | 27 | 28 | 30 | 33 | 35 | 37 | 39 | 114 |
|  | 27 | 28 | 29 | 31 | 34 | 36 | 38 | 40 | 116 |
|  | 28 | 29 | 30 | 32 | 35 | 37 | 39 | 41 | 118 |
|  | 29 | 30 | 31 | 33 | 36 | 38 | 40 | 42 | 120 |
|  | 30 | 31 | 32 | 34 | 37 | 39 | 41 | 43 | 122 |
|  | 31 | 32 | 33 | 35 | 38 | 40 | 42 | 44 | 124 |
|  | 32 | 33 | 34 | 36 | 39 | 41 | 43 | 45 | 126 |
|  | 33 | 34 | 35 | 37 | 40 | 42 | 44 | 46 | 128 |
|  | 34 | 35 | 36 | 38 | 41 | 43 | 45 | 47 | 130 |
|  | 35 | 36 | 37 | 39 | 42 | 44 | 46 | 48 | 132 |
|  | 36 | 37 | 38 | 40 | 43 | 45 | 47 | 49 | 134 |
|  | 37 | 38 | 39 | 41 | 44 | 46 | 48 | 50 | 136 |
|  | 38 | 39 | 40 | 42 | 45 | 47 | 49 | 51 | 138 |
|  | 39 | 40 | 41 | 43 | 46 | 48 | 50 | 52 | 140 |
|  | 40 | 41 | 42 | 44 | 47 | 49 | 51 | 53 | 142 |
|  | 41 | 42 | 43 | 45 | 48 | 50 | 52 | 54 | 146 |
|  | 42 | 43 | 44 | 46 | 49 | 51 | 53 | 55 | 150 |
|  | 43 | 44 | 45 | 47 | 50 | 52 | 54 | 56 | 155 |
|  | 44 | 45 | 46 | 48 | 51 | 53 | 55 | 57 | 160 |
|  | 45+ | 46+ | 47+ | 49+ | 52+ | 54+ | 56+ | 58+ | 160+ |

## THE MEANING OF I.Q.

I.Q. or intelligence quotient is a general assessment of your ability to think and reason. Your I.Q. score is actually an indication of how you compare in this ability with the majority of people in your age group. For example, a rating of 100 means that, compared to the majority of other people in your age group, you have a normal rate of intelligence: Most psychologists consider those falling in the range of 95105 as having a normal or average I.Q. Since it is difficult to pinpoint with absolute accuracy, your actual I.Q. may vary 5
points either way from your test score. In addition, there are many factors that may effect your scoring. If you are tired, ill or distracted, your score will be affected. Finally, there are many abilities that are not measured by I.Q. testing. For example, I.Q. does not measure musical talent, manual dexterity, or a variety of other abilities. However, I.Q. testing does give you an important indication of your ability to think, reason and solve problems. This is critical to your success in life.

# How Do I Improve My Intelligence Quotient (IQ)? 

By Garry W. Johnson

Between your ears is three pounds of protein, fat and fluid that houses the real you. It is the most complex structure in the known universe, and the better it functions the more you will be able to accomplish in life.

Your brain accounts for only about $2 \%$ of your total body weight, yet it consumes about $25 \%$ of your body's oxygen and $70 \%$ of its glucose (what your body burns for energy). In fact it is the single most active energy consumer of all your organs - and it never rests. With a relative consistent rate of energy consumption day and night, the brain's metabolic rate actually increases slightly when you dream. So while your muscles are taking it easy, your brain is still pulling its weight.

## BUILDING CONNECTIONS

It is estimated that you have 100 billion neurons in your brain and spinal cord linked together in circuits, not unlike the electrical circuits in a computer. The neurons in your brain are continually changing with every new skill you acquire. As you learn and practice each new mental activity, they are building new pathways and modifying the size or number of brain areas involved. This alters your brain and changes the way it functions. Continue to expose your brain to new and diverse stimuli, and you could potentially build yourself a supercomputer. Cut off the flow of data, and you may be stuck with a Commodore 64. (If you are too young for that reference, ask an old head.)

This ability of neurons to change in structure and function is called neural plasticity, and it is a major key to optimizing your brain's fitness. New learning opportunities are essential for young adults as their brains continue to develop through age 30 . But learning also slows decline in brain functioning of those in late adulthood, as measured by better performance on intellectual and perceptual tasks. Your brain continues to evolve and change every day you are alive; neural networks and patterns of activity are affected by your every learning experience - so take advantage of every opportunity at every age. Neural plasticity ensures that your IQ does not have to be a fixed trait.

## GETTING PHYSICAL

I know you have heard the maxim, "Use it or lose it." But did you know this expression applies to the brain as well? With underusage and age, the cerebral cortex (the outermost layer of the brain) can shrink by as much as 0.5 to $1 \%$ each year. But don't panic; physical exercise can bulk up your brain!

Physiologists and neuroscientists have produced evidence showing exercise seems to slow or reverse the brain's physical decay and can contribute to neurogenesis - the creation of new brain cells. Your brain has this reparative ability throughout your lifespan, but you have to give it what it needs.

Virtually any type of physical activity can improve brain structure and reduce the risk of Alzheimer's by a whopping 50 to $60 \%$. Endurance exercise boosts the size of the hippocampus, the part of the brain responsible for memory and learning. One study shows that it takes only 20 minutes of aerobic exercise to improve long-term memory. But the best exercises are those that engage the brain and the body, involving coordination, rhythm and strategy. Maybe REACH can start a tae-bo class.

Evidence of cognitive gains produced by exercise is evident across all age groups. Elementary schoolchildren exercising just 40 minutes a day scored an average IQ increase of 3.8 points. College students who worked out before class improved test scores by $17 \%$ on average. And people 50 and older scored $20 \%$ higher on cognitive tests after a six-month workout regimen.

## AND FINALLY, THE OMEGA

Despite the assertion (correct as it may be) that "fish oil pills are for your joints" (Inmate Council, June), they work far better on your brain! Omega-3 fatty acids are essential to both the structure and everyday function of the brain $-60 \%$ of which is fat. The fish oil softgels from our commissary contain 120 mg of docosahexaenoic acid (DHA) and 180 mg of eicosapentaenoic acid (EPA). Together these omega-3s make up $14 \%$ of the fatty acids in the brain, critical components of brain cell membranes and many messenger molecules. They foster the processing of information, stabilize mood and stave off cognitive decline.

Researchers who gave schoolchildren 600 mg DHA supplements for four months found kids who tested two years behind in reading experienced "significant effects." The study recommended the supplements be a "targeted intervention for the poorest readers." Parents also reported fewer ADHD-type behavior problems across the board.

Nutritionists and researchers agree that it is best to get omega3 s from food, both those found primarily in vegetables and the DHA and EPA supplied by fatty fish (including tuna and sardines) and algae. However, even folks on the street are not getting sufficient levels. The mean intake of DHA in the U.S. is 80 mg a day; the median is 30 to 40 mg . Neuroscientists believe that 500 mg a day of omega-3s, with an emphasis on DHA, is a minimum for supporting brain function. So unless you can afford a daily dose of tuna at $\$ 1.22$ a pack - those fish oil softgels at $\$ 3.86$ for 50 days ( 2 softgels -680 mg of omega-3s per day $/ 240 \mathrm{mg}$ DHA) are a bargain for boosting your IQ ability.

So here you have the rundown on three effective ways to improve your IQ: wide-range learning, staying physically active and charging your system with omega-3s. Now its up to you!

[^0]
[^0]:    Sources: Psychology, The Science of Mind and Behavior, Third Edition, © 2007; "Crosstrain Your Brain," The Philadelphia Trumpet, July 2016; "Ich Bin Ein Fathead," Psychology Today, December 2015

