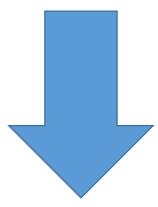
### **Science: Animals including Humans**

### **Changes in Old Age**



**TASK 1- Changes** 





Physical Changes	Other Changes

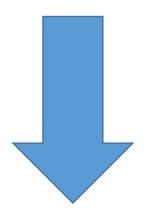
# **TASK 2- True or False**

# True or False



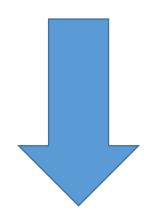
Looking at cards below, decide if the information is true or false, and give reasons for your answers.







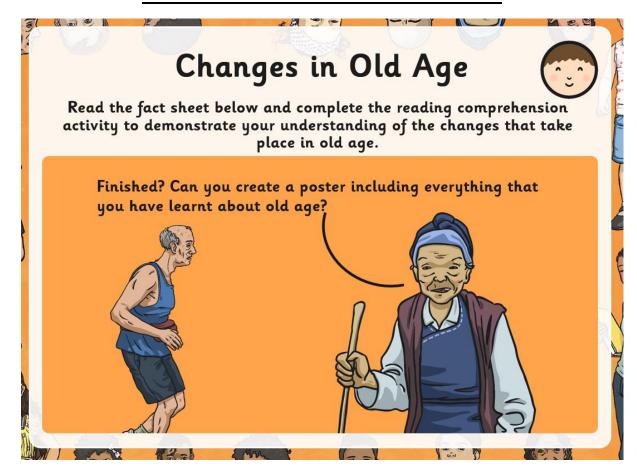
#### SCROLL DOWN TO THE NEXT PAGE FOR THE ANSWERS



### **ANSWERS**

True	False
Older people need a different diet to stay healthy. At different stages of development we do need to adjust our diets.	All older people start to become senile (suffer memory loss).  Only 30-40% of elderly people suffer from severe memory loss.
If you look after your teeth properly you won't lose them all when you are old.  If you look after your adult teeth they should last you into old age!	In old age, it is normal to be sick. In old age, the immune system (which fights diseases) does get weaker. This does not mean it is normal to be sick.
Older people need to exercise.  During all stages of human development exercise is important to stay healthy.	There is nothing you can do when you are younger to be healthier when you are older.  Of course you can and must! If you are healthy when you are younger then it helps you to be healthier as an adult and in old age.
Older people can learn new skills. You are still developing mentally even in old age and older people can and do learn new skills. It can take them longer than a younger person but it is not less likely to happen.	Older people can't look after themselves.  The amount of care and help you need when you are older is completely different for each person. Some older people do need a lot of care while others continue to be independent.
The changes people go through as they get old are different for each person.  No two people age in the same way and how you age depends on your mental and physical health.	All older people need help to walk.  The idea of old people needing walking sticks is not completely false — some do and some don't. We know more about how to stay healthy now so it isn't as normal as it was in the past to see someone in old age with a walking stick.
Old age is the final stage of development for humans. This is true — there are no further stages of development after old age.	Humans start to age at 60. You age throughout your whole life! Some people refer to 'becoming elderly' as 'aging' but the two are not the same thing.

### **TASK 3- READING COMPREHENSION**



### Old age- Fact sheet

Old age is the last stage of human development. There are some physical changes that take place for all older people. The body is made up of cells and these cells age over time. All cells die because they are programmed to do so. They then get replaced by new cells. However in old age this process of generating new cells slows down for all people but the extent to which aging leads to ill health or problems does vary from person to person.

New nerve cells still form in old age. New connections are still being made. Lower chemical levels can make older people 'slower' but they are still do things accurately. The brain always has more cells than it needs.

Skin tends to become thinner and finely wrinkled. Less blood flow makes it harder for skin to heal.

As the organs don't function as well they do not always break down nutrients as well either. This can effect parts of the body such as bones. If bones are not absorbing the calcium they need they will get weaker and become more fragile.

Changes in vision are normal as the lens in the eyes stiffens making it harder to focus on closer objects. Also many older people need more light to be able to read.

Hearing decreases especially the ability to hear high pitched sounds.

Muscle strength does start to reduce from the age of 30. As you age you lose about 10-15% of muscle mass and strength.

Organs (such as the heart) are made of cells and if the process of new cells being created slows down it does decrease the ability of those organs to work effectively.



Skin	The amount your skin wrinkles is affected by how well you look after it throughout your life and not just in old age. Spending too much time in the sun over your lifetime will eventually leave you with deeper wrinkles, skin blotches and skin reddening. Always use sun protection creams and avoid sun burn.
Muscles	All adults suffer muscle loss but if you exercise throughout your life, including when you are older, you can ensure that muscles remain strong and healthy.
Organs	The fact is that a normal heart will function well throughout your lifetime. Still it is easier for younger hearts to pump blood around the body than older hearts. So while an older person may not be able to outrun a younger person — it does not mean they can't run or be healthy. It is important to be active throughout your life.
Brain	The brain develops throughout your whole life. It is important to avoid activities that will damage brain cells as this damage can be permanent whatever your age. Some people do become senile due to age and due to factors they can't control. However, people who stay active and healthy are able to reduce the risk of such diseases when they are older.

# **Reading Comprehension Questions**

1. Which stage of human development is old age?
2. What causes the main physical changes during old age?
3. Name two changes in old age that occur for all humans:
4. Name two things you can do during your whole lifetime to ensure you are healthy when you are in old age?
5. 'It is normal to go senile when you are older'. Do you agree or disagree with this statement? Give reasons to support your answer. (Include facts you learnt from the Old Age True or False Cards)
6. What aspects of old age would you want to learn more about? Write these as questions (For example: why does sunburn cause wrinkles?)

#### **ANSWERS**

Which stage of development is old age? (Retrieve, record and present information from non-fiction.)

The last stage of human development.

What causes the main physical changes during old age? (Retrieve, record and present information from non-fiction.)

The fact that cells die and do not regenerate in the same way as when humans are younger.

Name two changes in old age that occur for all humans: (retrieve, record and present information from non-fiction).

Answers should include two of the following:

- · Cells die and regenerate slowly
- Hearing decreases especially the ability to hear high pitched sounds.
- · Lenses in the eyes stiffen, making it harder to focus.
- Older people need more light to be able to read.
- Skin becomes thinner and finely wrinkled.
- · Nutrients are not absorbed as well
- · Organs work less effectively.

Name two things you can do during your whole lifetime to ensure you are healthy when you are in old age? (Retrieve, record and present information from non-fiction.)

- · Answers should include two of the following:
- Wear Sun Protection Creams
- Avoid sunburn
- Exercise regularly
- Be active
- · Eat a healthy diet

'It is normal to go senile when you are older'. Do you agree or disagree with this statement? Give reasons to support your answer. (Provide reasoned justifications for their views.)

Children should disagree with this statement as at most one third of people over 70 suffer from some form of senility. The brain is still able to make connections and while older people may be slower to complete tasks they are still able to remember how to do them.

What aspects of old age would you want to learn more about? Write these as questions (For example: why does sunburn cause wrinkles?) (Ask questions to improve their understanding.)

Children should write questions that would help clarify their understanding. If they have already shown they understand the concept or idea then these questions are not appropriate to further develop their knowledge unless they ask a more specific question to a general one — e.g. 'does the brain make new connections?' would not support further development whereas 'why does the brain receive less chemicals?' would.