

HighLight Key - Critical Thinking

Critical thinking is an approach to knowledge which aids subsequent judgement and action. It takes us beyond knowledge and understanding to unlock wisdom through careful examination which enables the knowledge to be put to use. Critical thinking can be misunderstood. Wise criticalthinking is not critical in a negative way; it is not negatively motivated criticism. Rather, it involves carefully thinking through a decision, method, belief or argument. Some who are logical and analytical are more predisposed to critical thinking; others may not initially find this so natural: however, we are all able to develop this faculty. Jesus, the master teacher of all time, demonstrated critical thinking on many occasions. Critical thinking, if based only on human reason, can become futile. It needs to be brought alive by the Holy Spirit. This key explores four elements of critical thinking and how to apply them in the classroom.

Four elements of critical thinking:

- 1. Asking questions
- 2. Evaluating
- 3. Making connections
- 4. Finding different ways of seeing

1. Asking questions

"Why do you call me good?" (Mark 10:17-18) Jesus is very alert and immediately challenges the thinking of the rich young ruler who has just called him 'good teacher'. Jesus adds: "No one is good – except God alone."

Asking questions is crucial to critical thinking because this puts the one asking the question in the position of a learner. Another example which achieved this was Jesus' frequent question: "What is the Kingdom like?" Questions come in all shapes and sizes but can be very revealing to the teacher. One child's question may come from a lack of understanding. Another child's question may come from a place of understanding but they are teasing out the implications of some new knowledge or way of thinking. Making room for questions helps the teacher to assess the kind of learning the pupil is making. There are various theories about questions and thinking skills a teacher can use to help children develop through 'higher-order' questions which will require them to move from factual remembering to issues of evaluation or greater understanding.

For example:
Developing from: What happens to water when it rains?
To: Why does it rain?
<u>OR</u>
To: What are the implications of it raining? (floodings, crop growth, climate change etc.)

Teachers can model critical thinking by the questions they ask. Giving room for pupils to articulate and examine the reasons they have requires a deeper understanding of issues than a repetition of facts or a memorisation exercise. It is important to cultivate a supportive and open atmosphere of enquiry rather than being adversarial or negative in the use of questions. There are negative questions regarding God's ways or words which can lead to a lack of faith e.g. in Genesis 3:5 the serpent questions Eve, 'Did God really say you cannot eat5 of nay tree in the garden?' Where questions are rightly used, it can lead to a firmer confidence and a flourishing understanding.

2. Evaluating

Jesus was criticised for healing and forgiving the paralytic. "Which is easier: to say to the paralytic, 'Your sins are forgiven', or to say 'Get up and walk'?" (Matt. 9:5)

When we seek to encourage students to be critical thinkers we want to help them evaluate what they encounter. 'Should I believe this headline?' 'What do I make of this plan?' In this aspect of critical thinking we are trying to help them to consider the truthfulness of statements and whether claims can be supported by evidence. Jesus was accused of casting out evil spirits because he was working with Satan. Jesus asked his critics to evaluate the logic of what they were saying. He asked: "If Satan drives out Satan, he is divided against himself. How then can his kingdom stand?" (Matt. 12:26)

Evaluation causes pupils to think about the strength of evidence; whether we should accept or reject it. It helps them assess how cautious or confident they can be in making decisions on the basis of such evidence. Learning from a textbook may be one thing but learning to ask evaluating questions about who wrote the textbook or why we can believe it develops greater discernment. Children often find this approach fascinating and it opens up an active exploration of the meaning of the world.

> Evaluating has at least two meanings: - assessing truth or falsehood - making a judgement about quality

- making a judgement about quality

Many situations that pupils face in school, and that people face in the wider world, do not have a simple right answer that can be found in a textbook. There may be conflicting ideas about how to make decisions or the right way to approach an issue. Providing pupils with the opportunity to work out which might be the best (or preferred) approach for solving a problem, or getting something done, helps pupils to learn to evaluate. It is important to train them to ask for the help of the Holy Spirit (himself a spirit of wisdom) in such situations. Sometimes it may not be a question of 'right' or 'wrong' but a choice between several good options. For example, it may be how to reward good behaviour or correct poor behaviour; or how to raise finance for a worthy objective.

3. Making connections

Thinking critically involves making connections. This can involve the pupil teasing out an implication of a theory or process. For example, if we have taught that God uses a water cycle, the question which applies this to a desert situation requires further connections to be made. (There is still a water cycle in the desert but it is very sporadic and infrequent.) Jesus caused his disciples to make connections when he asked: "What do you think, Simon? From whom do the kings of the earth collect duty and taxes – from their own sons or from others?" He then taught Peter that sons were exempt but that in order not to cause unnecessary offence, tax needed to be paid. (Matt. 17:24-27)

Making connections is an important part of thinking critically because it transforms and takes further the knowledge presented, leading to new insights, understanding and applications.

Another powerful aspect of making connections is learning to perceive links between different 'areas' of curriculum. When pupils are taught subjects separately it can be hard to integrate understanding across them. A pupil who thinks they are bad at maths but good at music may not be seeing the links between the two subjects. A teacher can draw out that it may not be helpful, or even true, to think of oneself as 'good' or 'bad' at a subject when there are so many connections between them. An example, following on from water cycles, might be to ask: "Where else do we see cycles in creation?" Pupils might then think about nitrogen or carbon cycles. On a simpler level, they may include the lifecycle of a butterfly or a cycle of seeds and fruit as seen in trees and the growth of more trees out of one seed. This kind of thinking helps them to develop wisdom as they go beyond memorisation of facts to greater understanding. It trains them to think about how to apply what they know and test the implications of their thinking. There is a connection between obedience and consequential blessing and conversely a connection between disobedience and loss of blessing.

Jesus challenged the woman of Samaria's faith beliefs by starting with the request for a drink of water and then extending her thinking to see a different type of faith, one which affected life and eternity.

4. Finding different ways of seeing

Jesus challenged judgementalism when he asked: "Why do you look at the speck of sawdust in your brother's eye and pay no attention to the plank in your own eye?" (Luke 6:41; Matt. 9:4). Such a question advances critical appreciation of how we 'see' others. He challenged Pharisaical definitions of spiritual 'uncleanness' when he taught his disciples: "Don't you see that nothing that enters a man from the outside can make him 'unclean'? For it doesn't go into his heart but into his stomach, and then out of his body ..." What comes out of a man is what makes him 'unclean'. Jesus is causing his disciples to see uncleanness in a different way, emphasising that it is evil coming out of a man's heart that makes him 'unclean'. (Mark 7:17-23)

'But that's how we've always done it'

Finding different ways of seeing something challenges traditional thinking to see if there is a better way. It is an element of critical thinking that is associated with 'lateral' or 'divergent' thinking. A famous simple example is to think of as many uses for a paperclip as possible. A wonderful idea from

one child was to bend it to make a coat-hanger for a doll's house! An even more inventive solution was that perhaps it could be a giant paperclip and it could be bent into shape to make a chair or a hang-glider structure to be covered with material and so on! This skill of finding different ways of seeing can be applied in many different areas:

- When presented with an argument, it can be about thinking of counter-arguments.
- It can be about asking: What's missing? What's been left out and why? and, How does that make a difference?
- In problem-solving, it is about finding another solution, or more profoundly, another way of thinking about the problem altogether which opens up new solutions.
- Thinking of possible ways to end a story
- Asking: 'What could this character have done in this situation which would be wise?'
- In problem-solving it is about finding another solution, or, more profoundly, it might be another way of thinking about the problem altogether, which opens up new solutions

For teachers trying to encourage this way of thinking in the classroom questions again are a useful way of prompting pupils: What else could we try? Did anyone do it a different way? What might be another way we could answer/approach this?

Pupils can find these questions challenging but often it will elicit excitement as it tends to value a range of approaches and thinking rather than there being only one right solution. Sometimes there is just one right way of doing something but, where we encourage students to find different ways of seeing, we will be helping to foster deeper learning and collaborative problem-solving approaches. This can also promote humility in pupils (and their teachers!) as we learn to listen to the insights of others who may make suggestions we might not have considered.

Critical thinking

Critical thinking brings together the four elements explored in this paper and they can be integrated to reinforce each other. Where teachers have these elements in mind in their own approach to their subject, and in their interaction with pupils, it will enhance teaching and learning. It stretches and broadens pupils' thinking and can be used to provide challenge to pupils whatever their level of knowledge or understanding. To be mindful of critical thinking is to invite pupils do to more than memorise knowledge for a test, to satisfy their curiosity in understanding, but to unlock wisdom in reasoning through their thinking and beliefs and consider how they may apply what they are learning.

Critical thinking, when properly exercised, makes our pupils more discerning and ultimately wiser people who can benefit their employers and become more effective employees themselves.