

Saul, *Epilepsy* & Conversion

P.H. Brazier

KEY WORDS

| Saul/Paul | *Epilepsy* | Revelation-Conversion |
| Neurology | Trinity | *Yeshua Ha Mashiach* | Human Frailty |

ABSTRACT

The nature of Saul’s conversion event on the Damascus Road was cataclysmic and marked a profound change in the man and his beliefs, but also in the absolute and actual ontic nature of him as a human before God. In examining the conversion texts in Acts of the Apostles scholars have periodically raised the question, was Saul/Paul an *epileptic*? Initially we can examine the relevant biblical texts, we can then define, for the purposes of this essay, *epilepsy* and related neurological conditions. What has the academy decided on this question? Chief amongst our sources will be David Landsborough (medical doctor and bible scholar); also, what has a centuries old oral tradition decided? A fresh examination of the biblical text reveals details of other neurological conditions – Saul’s blindness and his healing, for example. While other examples in Acts refer obliquely to a disabling illness in Saul/Paul, that might appear to be *epilepsy*, historical diagnoses are fraught with difficulties. However, a possible, particular, diagnosis of *Scintillating Scotoma* does point to a divine sway on Saul in his transition to Paul: not simply a punishing encounter with *El Shaddai* (God Almighty), but a gruelling conversion to redemption in Jesus Christ: *Yeshua Ha Mashiach*.

“Saul, Saul,
why do you persecute me?”

“Who are you, Lord?”
Saul asked.

“I am Jesus,
whom you are persecuting.”

ACTS 9:4-5

INTRODUCTION

The question of the Apostle Paul and *epilepsy* has been raised periodically but with no definite conclusion. Scientists claim to work from a disinterested academic perspective yet exclude the possibility that God might just exist and interact with *His* creation: scientists will commonly regard the story of Paul as a religious delusion because something is clearly wrong, malfunctioning, with his brain! However, Paul’s conversion is not so much a medical manifestation, an illness, to be diagnosed and

treated, but an interaction with the one true living God: an encounter both on the mind – specifically the will and intellect – but very much on the actual brain, its circuitry and operation. Theologians and bible scholars seem afraid to countenance that Paul exhibits some of the symptoms of, for example, *temporal lobe epilepsy*, amongst other neurological conditions, for they fear this would, theoretically, invalidate Paul’s mission and achievements. In addition they are wedded to an *impartial* academic

neutrality that asserts a perfectly balanced all-encompassing intellect, from a healthy brain: this is seen as the only means of identifying and assessing divinity and truth. If Saul's brain was not "normal" could his perception and conclusions about the "gods," or even God, be seen as invalid, before an academic elite? This is the distinction, to a degree, between the temple and the academy: between Greek philosophy and Hebraic revelation.

The aim of this paper is to reassess the claims and counter claims and offer actual medical evidence (in relation to the scriptural text) which *might* point to certain neurological conditions that may be considered congenital, innate, to Paul, but divinely authored and swayed, in the sense that the Holy Spirit pressed on his mind-brain to get through to the old Saul, and then proffered a cure through the hands of Ananias.

The credentials for this paper reflect qualifications in theology and biblical studies, but is there ground for neurology? Yes—I have lived with *epilepsy* for thirty-seven years. Hilary and I met in December 1982 when she was in hospital, post *status epilepticus* (continuous *seizures* for hours, days, usually unto death); we married just over 6 months later after she was discharged. According to the diagnosis by the National Hospital for Neurology and Neurosurgery, Queen Square (University College London Hospital Trust) she has "refractory focal *epilepsy*, right hippocampal sclerosis with interictal left temporal abnormality, a history of *status epilepticus*, and chronic *migraine*." The condition was originally diagnosed in 1976, with evidence of mild *seizures* when she was a child. Hilary, to date, has had 14 episodes of *status epilepticus* (1982–2020).

2. SAUL/PAUL: WHAT DOES HE ASSERT

We are talking about Saul, who from his Damascus Road experience became Paul. Therefore considering that the key passages from the Acts of the Apostles, and the key events in his life that effect such a diagnosis and conclusion occur prior to the event of his conversion and renaming, then we are correct at this point to refer to Saul.

Saul, was known as a Pharisee of Pharisees, he rigorously and intensely sought out and persecuted the followers of Jesus, the adherents of "the Way."¹ The apostles and followers of Jesus, also converts, developed as a sect within Judaism in Roman-occupied Palestine: the thousands of first generation Christians were all Jews, either by birth or conversion. Paul notes, after his conversion, "You have heard, no doubt, of my earlier life in Judaism. I was violently persecuting the church of God and was trying to destroy it. I advanced in Judaism beyond many people of the same age, for I was far more zealous for the traditions of my ancestors." (Gal 1:13–14) In the Epistle to the Philippians 3:4–6 he outlines his critically zealous involvement as a Pharisee: "... of the tribe of Benjamin, a Hebrew of Hebrews; in regard to the law, a Pharisee; as for zeal, persecuting the church; as for righteousness based on the law, faultless." (Phil 3:4–6). This mission led him to be involved in the stoning of Stephen. Luke accounts for Saul's zealous participation:

... and the witnesses laid their coats at the

1 Early Jewish Christians referred to themselves as "The Way" (ἡ ὁδός), probably coming from Isaiah 40:3, "... prepare the way of the Lord." According to Acts 11:26, the term "Christian" (Χριστιανός) was first used in reference to Jesus's disciples in the city of Antioch, meaning "followers of Christ," by the non-Jewish inhabitants of Antioch. The earliest recorded use of the term "Christianity" (Χριστιανισμός) was by Ignatius of Antioch, in around 100AD.

feet of a young man named Saul. While they were stoning Stephen, he prayed, “Lord Jesus, receive my spirit.” Then he knelt down and cried out in a loud voice, “Lord, do not hold this sin against them.” When he had said this, he died. And Saul approved of their killing him. That day a severe persecution began against the church in Jerusalem ... But Saul was ravaging the church by entering house after house; dragging off both men and women, he committed them to prison.

Acts 7:58–8:3

nor was I taught it; rather, I received it by revelation from Jesus Christ. For you have heard of my previous way of life in Judaism, how intensely I persecuted the church of God and tried to destroy it... But when God, who set me apart from my mother’s womb and called me by his grace, was pleased to reveal his Son in me so that I might preach him among the Gentiles, my immediate response was not to consult any human being.

Gal 1:11-16

3. THE SAULINE CONVERSION

So what did Paul – and Luke – write? There are three accounts of his conversion, penned by Paul in the Epistles. In the first epistle to the Church in Corinth Paul questions is he not free? And proves his credentials as an apostle: he had seen the Lord, his work and mission is validated because of his meeting with the Lord on the Damascus Road (1 Cor 9:1). Addressing the Corinthians he asserts, “you are the seal of my apostleship in the Lord.” Paul also writes, how *Yeshua Ha Mashiach* (Jesus, the Anointed One, the “Christ”), died for our sins – as was set out in the Hebrew scriptures – buried, raised on the third day, again, in accordance with the scriptures and the entire Hebraic-Judaic witness, and how he appeared to Simon Peter, then to the twelve, including James, and to the many: “Last of all, as to one untimely born, he appeared also to me” (1 Cor 15:3–8).

In the opening chapter of The Epistle to the Galatians Paul refers obliquely to the foundational, grounding influence, of his conversion as a divine revelation: *Yeshua Ha Mashiach* appeared – cataclysmically – to Paul:

I want you to know, brothers and sisters, that the gospel I preached is not of human origin. I did not receive it from any man,

So what precisely was this revelation? What concerns us are the details in the three accounts penned by Luke in Acts. There are three overlapping accounts: Acts 9:1-19 (the primary account), Acts 22:6-16 and Acts 26:12-18 (recapitulatory and reflective). Saul, travelling from Jerusalem on the Damascus Road recounts his mission of persecution, he falls to the ground as a bright light flashes around him and a voice announces himself as YHWH, Lord, Jesus. He is blind. A crucial detail for us is in the healing. This we will examine along with the details of Saul’s conversion. Many Bible scholars take the combined accounts in the New Testament to point to a diagnosis of *epilepsy*: in all probability, *temporal lobe epilepsy*. Specifically, the thorn in the flesh:

But I refrain, so no one will think more of me than is warranted by what I do or say, or because of these surpassingly great revelations. Therefore, in order to keep me from becoming conceited, I was given a thorn in my flesh, a messenger of Satan, to torment me. Three times I pleaded with the Lord to take it away from me. But he said to me, ‘My grace is sufficient for you, for my power is made perfect in weakness.’ Therefore I will boast all the more gladly about my weaknesses, so that Christ’s power may rest on me.

2 Cor 12:6-9

4. POSTLAPSARIAN: ARE WE STILL NORMAL... OR ABNORMAL?

God looked on creation and declared it was good. Not necessarily perfect, not divinely flawless, not impeccable, not unimpeachable, not unsullied or spotless: but *fit for purpose*, good – having the required qualities, of a high standard, valid. This is important; there is infinite potential in creation, subject to entropy, the limits of created matter. There are flaws in creation – creative flaws so we exist! In addition the *Fall*, the consequences of original sin, has led humanity to damage itself to a significant and irretrievable level: we are born mired in sin, corrupted, depraved and lost, but not irredeemable: *errare humanum est, perseverare autem diabolicum*² – to err is indeed human, to make mistakes, but to lose sight of these errors and to reinforce them with further fault is diabolical, it is, according to Seneca, of the devil. (We are not, however, *totally* depraved, we can still glimpse how we should be, but we cannot heal ourselves; only Christ can.) Various tribal groups in the West today will assert, in the promotion of their particular lifestyle, sexual practice, and gender identification, even Weltanschauung, that there is no such thing as normal. Exponents of traditional/orthodox Christians may balk at this, seek to counter with what God has given, what God has created, arguing for a God-given norm, a default position for humanity – and the Bible does bear witness to this – but ironically the idea that there is now no norm is actually correct: since the *Fall* the human has re-created itself as a bizarre,

2 Attributed to Lucius Annaeus Seneca (Seneca the Younger, 4 BC – AD 65). See, *Epistulae morales ad Lucilium* – collection of 124 letters dealing with moral issues written to Lucilius Junior. English translation: Margaret Graver & A.A. Long. *Letters on Ethics: To Lucilius*. Chicago: University of Chicago Press, (2015)

dissolute and corrupt creature, not made by God. Paul and Augustine would surely have concurred. And physical traits/conditions resulting from our arrogant rebellion can be passed on so that, for example, the condition of our brain is far from normal.³ So, we are sullied, changed, damaged – by our own wilfulness – a far from normal brain can be bequeathed to a new person in the womb Was there a congenital flaw in Saul's brain that manifested itself on the Damascus road?—that allowed God in, so to speak?

5. TEMPORAL LOBE EPILEPSY

Temporal lobe epilepsy (TLE) is a chronic disorder of the nervous system characterized by recurrent, unprovoked focal *seizures* that originate in the temporal lobes (left & right sides) of the brain and last from a few seconds to 5-10 minutes; if longer this becomes a diagnosis of *status epilepticus* – continuous *seizures* for hours, even days, until the brain effectively destroys itself. *Temporal lobe epilepsy* affects the two temporal lobes and hippocampi (junction boxes, effectively, that channel sensory input to the temporal lobes). The temporal lobes analyse this sensory information by comparing with memories laid-down in the individual's memory, and thereby make sense of the world we live in. At its most basic *epilepsy* is a temporary physical breakdown in the wiring – the synaptic pathways – in the brain.

Epilepsy is a neurological condition, of the brain, but affecting the spinal cord, indeed the entire central nervous system. The medical condition of *epilepsy* (repeatable *seizures* caused by what is considered to be abnormal brain

3 For example, see, P.H. Brazier, 'Towards an Understanding of the Ontological Conditions issuing from Original Sin', in *The Heythrop Journal*, Vol. 60, No. 5, September 2019, pp. 739-768.

activity) holds a unique place in relation to mind and soul, the supernatural and eternity: God and salvation. The ancient world considered *epilepsy* to be a sacred disease, though the Greek tradition from the time of Hippocrates of Kos, sought to isolate the brain-mind from eternity and from un-quantifiable spiritual influence.⁴ The idea that these *seizures* were caused by stress was a common argument by apparently enlightened medical professionals in the nineteenth and early twentieth centuries (including Sigmund Freud). These experts then attempted to project their analysis back on to historic figures. Such a conclusion, and retro-projection, is now considered flawed and wide-of-the-mark by neurologists.⁵ Anecdotes and speculation as to the cause of *epilepsy* in historical figures are considered unreliable: there is simply not enough actual evidence to determine the cause. While near impossible it may be, to pin down cause, convulsions and *seizure* patterns can be observed from written records, biographical accounts.

Epileptic seizures may be caused by an injury to the brain, or may be congenital. A diagnosis may issue from the culmination of very mild *seizures* during childhood – moments of frozen expression, absent mindedness, losing all sense of continuity and place just for a second – which often indicate an underlying latent *epileptic* condition before the onset of actual and observable *seizure* events. *Seizures* may be focal

or generalized. Focal *seizures* are caused by a small area of scar tissue in the brain; generalized *seizures* offer no focal point. *Seizures* cause minute damage in the brain, and therefore leave scarring. Such scarring then triggers further *seizures* of increasing intensity, because at its most basic *epilepsy* is simply a minute electrical malfunction, a repeatable glitch or flaw/fault, in the brain’s wiring, in the synaptic pathways that provide the conditions for thought. From a reductionist perspective these electro-chemical events are taken as the sole manifestation of ‘thought,’ but the functioning synaptic pathways do not so much constitute our thoughts, as provide a vehicle for our thoughts. As the scarring increases, the number and intensity of the *seizures* increases.

i. *Epilepsy ... and an Eschatological Crisis ?*

Epilepsy may under certain circumstances be considered to be eschatological because the condition of *epilepsy* can foster dualistic, binary thinking, and as such has an inclination towards an eschatological way of seeing the world; in addition, there is a sense in many *epileptics* of the need for urgency in decision making, in dealing with a crisis, a sense that everything is coming to a head, that judgment is coming (these thoughts often precede a *seizure* of varying intensity). This may be considered a particular interpretation of eschatology when most people do not concern themselves with the crisis of life and the risk of eternal judgment. *Epilepsy* can lift people out of a worldly complacency, it is not an inconvenient illness that occasionally disables the individual. An *epileptic* brain operates differently from a so-called normal brain. *Epileptically* conditioned beliefs significantly alter the superficial religious background (characterized by a relatively trite theological anthropology). Why? *Epileptics* are often forced into the position of outsiders. People around an *epileptic* fear a *seizure*, not just

4 *On the Sacred Disease* a medical work attributed to Hippocrates of Kos was written circa. 400 B.C.

5 See, Theodor Reik, ‘The Study on Dostoyevsky,’ in *From Thirty Years with Freud* (New York: Farrar and Rhinehart, 1940), 158–76. Freud’s analysis (that Dostoyevsky’s *epilepsy* was not caused by a physical flaw in the brain, but was a pseudo-*epilepsy*, the symptoms being brought on by stress and guilt, also hysteria) is now considered speculative and inaccurate. See also, Nathan Rosen, ‘Freud on Dostoyevsky’s *Epilepsy*: A Reevaluation,’ *Dostoevsky Studies* 9 (1988) pp. 107–25. For a theological analysis of Dostoyevsky’s *epilepsy* see, P.H. Brazier, *Dostoevsky: A Theological Engagement* (Foreword, Murray Rae; Eugene, OR: Pickwick Publications, Wipf and Stock, 2016).

because they do not know how to cope with it, but it un-nerves them – they fear losing their own mind, not being in control, and they fear the risk of death (*SUDEP*: sudden unexplained death from *epilepsy*). Outsiders, like lepers in the biblical world of Jesus, or the blind, the lame, the disabled, who are ostracized from the Jerusalem temple cult and religion, these people either love Jesus, or loath him: the Gospel sees such matters in terms of light and dark, either-or, angels or demons, heaven or hell. Such is the case with *epileptics*, even if the condition is relatively well controlled. It may be speculated that this is why the marginalized, the afflicted, the suffering outcasts, saw Jesus and responded strongly: either one way or the other.

ii. *Epilepsy ... and a Scientific World View?*

The only way to look at Paul's conversion, and whatever medical event we might read from it, is eschatological. A *krisis* builds, judgement occurs: death, or near-death, triggers change – the world still remains the same, but there has been a change in people, this is movement, either the movement towards salvation or, for some, a movement away from salvation into damnation. The ancient Greeks, and the Romans to a certain extent, understood this in a way that many Christians today fail to: what we do in the here-and-now echoes through eternity.

Let us briefly consider *epilepsy* and cause.

The standard reductionist (i.e., modern/scientific) approach to *epilepsy* – reflecting the closed-off world of Kantian philosophy – conceives of *epilepsy* as a brain disease, a malfunction in part of the grey matter/flesh inside the skull that is manifested by the synaptic pathways between brain cells. Any spiritual dimension is simply where the sensation in a person's mind leading up to a *seizure* may, under certain circumstances, and according to the individual's background, be given a "religious"

gloss: thus is the reductionist, nihilistic, deterministic, world view about *epilepsy* from the *impartial* scientists. Feelings of warmth, light, contentment, pleasure, heightened awareness, and so forth – these are considered by psychologists and neurologists to be "religious" (though without an accompanying definition and explanation of what being religious actually is, and with no reasoned attempt at a theological analysis). Thus, *epileptic seizures*, where there is consciousness of the pre-*seizure* or actual *seizure* in the *epileptic*,⁶ are often considered spiritual, but this is a no more than a comment upon the individual experts interpretation of the event. The psychologists and neurologists themselves do not make sense of the event theologically, but regard *epilepsy* as yet another brain activity, subjective and contained within a closed-off Kantian universe. They may indeed deny the reality of any spiritual – or supernatural – dimension to the world that transcends the psyche of human beings, but the best they can honestly summon would be agnosticism.⁷ But what can be deduced from the other side from the psychologists and neurologists?—from someone who is *epileptic*? Hilary, in response, writes:

It is essential to accept that the *seizure* is a physical, medically defined condition, yet I have come to believe, to know deep

6 A *simple partial seizure* involves a degree of conventional consciousness by the *epileptic*; a *complex partial seizure* involves no *conventional consciousness*, but *altered consciousness*, as the individual will still walk, try to talk, bump into things, but have no more understanding of the world and its dangers around her/him that a ten-month old child just beginning to walk (a state of *complex partial seizure* can sometimes be similar to advanced dementia). The depth of a *complex partial seizure* may lead into a full-blown *seizure (tonic-clonic)* with total loss of consciousness and the risk of brain death.

7 See Coles, Alasdair. "Temporal lobe epilepsy and Dostoyevsky seizures: Neuropathology and Spirituality." Published online, Royal College of Psychology, 2013: <https://www.rcpsych.ac.uk/pdf/Alasdair%20Coles%20Temporal%20lobe%20epilepsy%20and%20Dostoyevsky%20seizures.pdf>

in the mind (the self as a ‘temple’ for the Holy Spirit’s work) that God notices the event as it occurs, and is able to guide, enlighten during the *epileptic* activity, in a way that is indeed beyond human, earth-bound understanding. It can be simply in the sense of revelation establishing a way forward having the knowing that the decision is of myself – God guides, showing that which was already in myself, but until that moment was hidden. *Seizures* can strip the mind of the detritus that masks, even attempts to obliterate wisdom, giving an enlightenment for which God gave the key within the dynamics of the *seizure*. It could follow that the mind in these circumstances onto the soul.⁸

iii. *Epilepsy ... and a Biblical World View?*

Things are different with the Bible; the Bible being a repository of God’s revelation and the truth about the reality we occupy and live out our lives in. The biblical world is invisibly peopled by angels and demons: spirits that underpin and influence the actions and beliefs of people. To the bible authors, these spiritual beings were not to be considered abstract ideas; angels and demons were not to be seen as psychological projections, they were to be seen as real – as real as people are; invisible, perceived by their sway, their influence on humanity, but nonetheless an actuality. Has Western humanity generally, even some of the mainstream institutional churches, by-and-large lost this understanding of the eschatological reality, the influences of good or bad spirits on the human mind? The proposition that we may be influenced in our thinking, in our beliefs and actions, by angels and demons is no abstract idea; it is a concept we find in the Bible, specifically the New Testament (but also in other religions).

⁸ Hilary Brazier. Unpublished notes, written May 26, 2020.

iv. *Evil ... and the Demonic?*

The apparent dualism between good and evil, angelic and demonic, between a closed-off reality, and a world porous to the eternal, this paradoxical duality may define the human condition, but it does not define God and *His* economy with creation. It is of paramount importance to note that in traditional Christian theology the devil is not a parallel “god,” equal to God, uncreated, co-existing from eternity. Rather, the devil, the arch-leader of demonic evil forces, is a creature, that is, created, an angel: often named Lucifer,⁹ Satan, later to be given as a common name for personified evil: the devil. He was good, in some ways the highest creation, from the brightness of angels, but he rebelled, set himself up as a “god,” and attempted to parallel God. Such a one could not coexist in heaven, in eternity. He fell. He was expelled (Rev 12:7–10).

Epilepsy may help to generate this “either-or” dualism but Scripture bears witness to a deeper understanding of the relationship between *seizures* and the world of angels and demons: an *epileptic seizure* (or for that matter cramp in the leg!) may be the result of an electro-chemical reaction in the brain or muscle, determined

⁹ The name/term Lucifer, corresponding to the Greek name, Ἑωσφόρος, “dawn-bringer,” is associated with the planet Venus in its morning appearances, as such it was often applied to religious and mythological figures deemed to be associated with the planet. This was because of the particular movement – erratic, sporadic and intermittent – and appearance of Venus in the sky. By associating mythological figures with stars and planets the mythology surrounding such religious characters often involved a fall from the heavens to earth or the underworld, therefore Venus’s apparent *fall* or disappearance is associated with the fallen angel, who mutates we might say into the devil, Satan. A similar term in the Hebrew Bible, (carried over into the AV edition of the English Bible) as “Lucifer,” is considered to be the beginning of the Christian tradition of applying the name Lucifer to Satan because of the *fall* from heaven. As such and as a name for the Devil, Lucifer is derived from the Hebrew word *hēylēl* (Isaiah 14:12). Modern reductionalist biblical studies take this etymology – the name for Venus, the planet – as an excuse for denying the existence of personified evil and the associated eschatological reality.

by our activities, and all that has led up to the person we are at a given moment in time; or, the apparent symptom of cramp, the *seizure*, may have been triggered by the influence of a spiritual being: invisible, but outside of our control (but like Satan in the Book of Job, not beyond God's purview!). The confluence of the physically generated symptom and the sway exerted by a spiritual, non-corporeal presence, creating the *seizure* is something of a temporal and ontic paradox (and are not such paradoxes proven by the study of quantum mechanics? – a single quanta may simultaneously exist ... and not exist): these encounters with a spiritual presence may be good or bad: such are angels and demons – governed as they are by a moral reality. Such spiritual forces may press or exert sway unconsciously over our bodies, but angels and demons – real or psychological – often whisper into the conscious mind of an individual, suggesting, inviting them to indulge in beliefs and acts that will in time ensure their *Fall* and condemnation into an eternal hell. But what are the worst demonically inspired beliefs and acts? War, politics, lying, false witness, treason, depraved sexual behaviour hiding behind a corrupted narcissistic concept of love? Judas, Herod and Pilate stand out as amongst the worst in the gospels: this is the repetition of Lucifer's fall and humanity's depraved addiction to original sin, often imposed on others through the body politic!

v. Good and Evil ... and Epilepsy?

Epilepsy defines frailty. It lays open our vulnerability. If the mind can be subject to forces from outside of what we take to be perceivable reality then not only bad forces but also good forces could act upon the mind, and in turn upon the brain. And good forces, good spirits, could trigger an *epileptic seizure* in one who is prone to such attacks in the same way

that more tangible triggers may cause an attack. If the brain, or part of the brain, has a weakness then something, even with good intention, may act as a trigger. This brings us to the trigger for the apparent *epileptic seizure* that struck Saul on the road to Damascus: a Spirit-enabled encounter with the risen and ascended Christ had a dramatic and cataclysmic effect on him (Acts 9:1-18). This reality of spiritual influence is more open, more noticeable, in *epileptics*. Ultimately it is a question: to whom do we belong: personified evil, or to God? Who are we exposed to? What influences us? Proximity and commitment to Christ, the incarnation of God, should alleviate such a danger: God protects *His* own. Genuine commitment to Christ will provide a pneumatological firewall, so to speak, against the wiles of the devil; but this spiritual protection is not available to those whose faith is false and disingenuous (Matt 7:21-23).

Spiritual protection, Grace, should protect individuals from the guiles and charms of the devil, the ever present invitation to *Fall*, to recapitulate on original sin, and from the subversive influence of demons. This is not favouritism; the potential is there for all humanity. It comes down to a question of faith and proximity: "Come to me, all you that are weary and are carrying heavy burdens, and I will give you rest. Take my yoke upon you, and learn from me; for I am gentle and humble in heart, and you will find rest for your souls." (Matt 11:28-29.) A Christian may have *epileptic seizures* and still be insulated by God's Holy Spirit from the demonic world. It comes down to the relationship between the individual and God: the promise of spiritual protection issues from Christ's resurrection.¹⁰

¹⁰ In Mark's Gospel, the boy who manifests *epileptic seizures* is in his right-mind, and morally sound before God after the *seizures*. An interesting question is, did this boy continue to have mild momentary *seizures*, or auras, after the exorcism at Jesus's hands; was there a residual *epileptic*

6. PAUL & EPILEPSY: THEORY & CONJECTURE

An ancient oral tradition in Ireland referred to *epilepsy* as *St Paul’s disease*. The assumption was that Paul was *epileptic*, that this was common knowledge, and that the oral thread went back to St Patrick, to Rome, to the Patristic Church and so to the sub-apostolic period: “In old Ireland, *epilepsy* was known as ‘Saint Paul’s disease.’ The name points to the centuries-old assumption that the apostle suffered from *epilepsy*.”¹¹

In 2003 the BBC (British Broadcasting Company, the National TV broadcaster) fielded a documentary on the Apostle Paul.¹² Within this programme the writer’s claimed that the apostle’s conversion on the road to Damascus may have been caused by an *epileptic seizure* or a freak lightning bolt. Such theories challenge the belief that Paul’s conversion was caused by divine intervention. The writers justify by quoting scientists who link religious experience with *epilepsy*. The assumption was that if his conversion was down to a neurological abnormality then this denied any encounter with God: Saul was deluded – according to the sceptics. There is for them no “god;” if there is a “god” then only a rational educated elite might have any perception or encounter ... therefore an educated liberal elite can rationalize God out of the picture: i.e., religious atheism? The writers of the documentary ignore the theory that the very weakness in the physical

condition no longer aggravated by demons, no longer life threatening, though at times of mild *seizure*, inconvenient?

11 *Deutsche Epilepsymuseum Kork* (Museum for *epilepsy* and the history of *epilepsy*: <http://www.epilepsiemuseum.de/alt/paulusen.html>. See also, P Vercelleto, “Saint Paul disease. Ectasia and ecstatic *seizures*” *US National Library of Medicine & National Institute of Health*: <https://www.ncbi.nlm.nih.gov/pubmed/7676119>

12 The documentary, broadcast on BBC1 on May 11, was presented by Jonathan Edwards, the athlete and Evangelical Christian.

flesh that constituted Saul’s brain was a point of contact with God: *Elohim, El Shaddai, YHWH: Yeshua Ha Mashiach?* The idea that the apostle’s conversion on the road to Damascus may have been caused by an *epileptic seizure* is approaching the encounter the wrong way round. The correct approach would be to assert that an *epileptic seizure* (if indeed it was such) assisted God. It was through a conversation with the divine that forced a change of heart in Saul:

As he neared Damascus on his journey,
 suddenly a light from heaven flashed
 around him.

He fell to the ground and heard a voice
 say to him,

“Saul, Saul, why do you persecute me?”

“Who are you, Lord?” Saul asked.

“I am Jesus, whom you are persecuting,”
 he replied.

“Now get up and go into the city, and
 you will be told what you must do.”

Acts 9:3-6

All fairly rational: Paul considered what was said to him, and converted. But this is not the words of Paul: “He fell to the ground...” is Luke the author and physician relaying what happened. What we have is a medical diagnosis of sorts.

Professor Vilayanur Ramachandran, neuroscientist has often postulated this idea, that patients who suffered *seizures* often had intense mystical experiences, that this did not rule out a divine role. “If God exists and he is interacting with us humans, he could have put an antenna in your brain to be sensitive to him or her ... Elaine Storkey, another leading Church of England theologian, told the programme: ‘An *epileptic* fit doesn’t turn someone’s life around. Something else was happening at a much deeper level.’”¹³

13 From a report and analysis of the documentary in *The Daily Telegraph*, April 19, 2003.
 See: <https://www.telegraph.co.uk/news/uknews/1427916/>

An even more bizarre theory, suggested by Dr John Derr, an American earthquake expert, is that Paul could have been struck by a bolt of electro-magnetic energy, similar to ball lightning, released by an earthquake – but what earthquake, which no one else experienced in the group! Such scientists assert in the programme that such an event could have triggered what Paul would believe to be a mystical experience, as well as leaving him blind for several days.

7. LANDSBOROUGH... & MEDICAL OPINION

Doctor, neurologist and bible scholar David Landsborough published a summary of theoretical diagnoses related to Saul's encounter with the resurrected Jesus: evidence speculatively offered to suggest a neurological origin for Paul's ecstatic visions, the physical state at the time of his conversion and related ecstatic experiences, with conjecture as to a diagnosis of *temporal lobe epilepsy*.¹⁴

Landsborough opens his study with what he considers to be examples of neurological disease. These are too numerous to elucidate here, subject to argue that these are conjectures. He then considers the precise nature of what Paul recounts as episodes that might be

considered *epileptic*. The only problem is that – except in the case of *partial seizures* – the patient has no knowledge of, or memory, of the *seizure*. Therefore we have a very slanted and incomplete description of the range of possible *seizures*. Often an *epileptic* cannot speak or write of attacks, however it is possible to be aware that an event has occurred post-*seizure*, but to be totally unaware of the *seizure* itself. As Landsborough notes, “Nothing is known about Paul's past health and family history.”¹⁵

It is clear from much that Landsborough quotes and discusses – “caught up in the third heaven,” “psychic auras,” “in and out of the body,” “ecstatic visions,” “buffeting,” “a thorn in the flesh” – that throughout his life Saul/Paul had some physical/mental condition (ailment) that set him apart from the people around him: exhibiting symptoms that can be experienced by people with *temporal lobe epilepsy*, but equally by people with no evidence of *temporal lobe epilepsy*, but symptoms related to the physical wiring of the brain. Though in Paul's case it seems reasonable to cite some neurological origin, that is, his brain worked in minute ways that were different to the average or “normal” person. However, we err if we do not acknowledge that “A person growing up with *epilepsy* regards the events, the aberrations, so to speak, as ‘normal,’ an *epileptic* knows the condition to an extent and knows the love of the One Creator, the Father in heaven, who will impart revelations beyond the scope of the normal.”¹⁶

A diagnosis of *temporal lobe epilepsy* for Paul depends on his own, subjective, descriptions: as recorded in the epistles, though assessed, as we have noted, by Luke the physician. Given that

St-Paul-converted-by-epileptic-fit-suggests-BBC.html
For Ramachandran's comments see, Vilayanur Ramachandran, *The Emerging Mind: The BBC Reith Lectures*, London: Profile Books, 2003, Chp 2 'Believing is Seeing,' pp. 27f.

See also, https://en.wikipedia.org/wiki/Reith_Lectures#2000s

See also: <https://www.independent.co.uk/news/science/belief-and-the-brains-god-spot-1641022.html>; Tuesday 10 March 2009.

See also, Alison Motluk, “Touched by the Word of God,” *New Scientist*, issue no. 2107, Nov 8, 1997:

<https://www.newscientist.com/article/mg15621071-000-touched-by-the-word-of-god/>.

14 David Landsborough, “St. Paul & *Temporal lobe epilepsy*,” *Journal of Neurology, Neurosurgery, and Psychiatry*, Vol 50, 1987, pp. 659–664.

15 Landsborough, “St Paul & *Temporal lobe epilepsy*,” p. 659.

16 Comments by Hilary, my wife, May 26, 220.

this requires remembering the event, then are these *simple partial* as distinct from *complex partial seizures*? And there is generally sufficient evidence in the much read events to suggest a neurological disorder, in all probability, *temporal lobe epilepsy*. Landsborough analyses these events,¹⁷ which I accept, therefore there is no need to repeat them here.

This raises questions about Paul’s remembrances. These are not like you or me recalling a discussion with a friend later in the day, or trying to piece together what happened in a car accident. No; it is likely that Saul had no immediate memory of what had happened on the Damascus road. But moments out of sequence would have returned after time had elapsed. Although in a *deep complex partial seizure* the individual does not appear to be consciously laying down memories from sensory information, however, post *seizure*, a sight or sound may just rekindle remembrance months later. For example Hilary, my wife, underwent an episode of *status epilepticus* in 1999. We were shopping. Hilary had disappeared into herself while we were at the supermarket checkout: a passive *complex partial seizure*. I managed to get her outside and onto a bus – hoping the *seizure* would pass and we could get home. However, after the bus had gone for one-and-a-half-miles, with the *seizure* deepening, Hilary went into a tonic clonic *seizure* (a classic shaking, falling, *seizure*), and collapsed into an episode of *status epilepticus* (continuous *seizures*) ... on the bus. This lasted for 2 hours: hospitalized for 4 days. A few weeks later when we repeated the trip, we left the supermarket, went to get onto the bus but Hilary shied away, she was racked by deep fear and would not get on the bus, she pointed to the wheel arch behind the entrance

17 Landsborough, “St Paul & *Temporal lobe epilepsy*,” p. 61.

door: it had been hastily and roughly patched, unpainted, from an accident and gave a unique identification signature to that particular vehicle. Then I realized: this was the very same bus we had got onto when she had been in a deep *complex partial seizure*, which had led into the *status epilepticus*! She recognized it; she now said so. I had recognized it also. I realized immediately the implication: during the deep *complex partial seizure* (precursor to the *status epilepticus* event) her brain had laid down the memory engram. But after the *seizure, a posteriori*, she had no access to the memories laid down during the *seizure* (like failing to remember a dream after waking). But the coincidence of this vehicle being the very same bus (it was the same route, the No. 57) we had been on during the *seizure*, had triggered a comparison and an identification.

How much of Saul/Paul’s remembrances issue – *post ictal* – from *complex partial seizures*? – in particular the conversion experience: recalled months, years, later? And how much recall was engendered, drawn out, of Paul, at the hands of Luke the physician.

Landsborough analyses the evidence in Acts, evidence written by Luke the physician either paraphrasing Paul, or presenting diagnosis in narrative: this is not a series of conclusions issuing from seemingly impartial medical examinations, but it is important to remember that Luke was a physician. He would have observed in the course of his work *seizures*, neurological conditions, and sought to identify, define a prognosis and attempt a cure. Landsborough considers length of attacks, what medical history we can deduce, *inter-ictal* states (evidence of personality disorder between *seizures*) and – crucially – Paul’s reflection on his conversion event. Within this analysis Landsborough effectively

dismisses the regaining of Paul's sight as being of any significance: "The expression something like scales fell from his eyes is probably a metaphor describing a rapid return of vision." Landsborough assumes these "scales" – ὡς λεπιδες – happen for a brief period, less than a minute, as he regained his sight, rather than being a characteristic of his three days of effective blindness.

Landsborough examines the speculative conclusions of neurologists, psychologists as to Paul's religiosity and the question of post-ictal blindness (light-out blindness, an empty black field of vision), and other theories but in the end draws an open conclusion.

8. SCINTILLATING SCOTOMA

A pertinent detail in the account of Saul on the road to Damascus has effectively been overlooked. Yes we may cautiously assert that a Spirit-enabled encounter with the risen and ascended Christ had a dramatic and cataclysmic effect on him (Acts 9:1–18). However, his symptoms are reminiscent of an *epileptic seizure* (phasing between *simple partial* and *complex partial*, between *consciousness* and *altered consciousness* – in one of the temporal lobes), both in the attack on the road and in the details given at the point of his healing at the hands of Ananias: Saul/Paul's temporary blindness (an extended period of *postictal status*?) indicates the possibility of a *seizure* in the rear of the cerebral cortex (the outer layer of the brain), which processes information from the eyes before sending it to the temporal lobes for interpretation, recognition, and so forth. This period of *postictal status* appears to have generated *Scintillating Scotoma*, or conversely *retinal migraine* (the two conditions

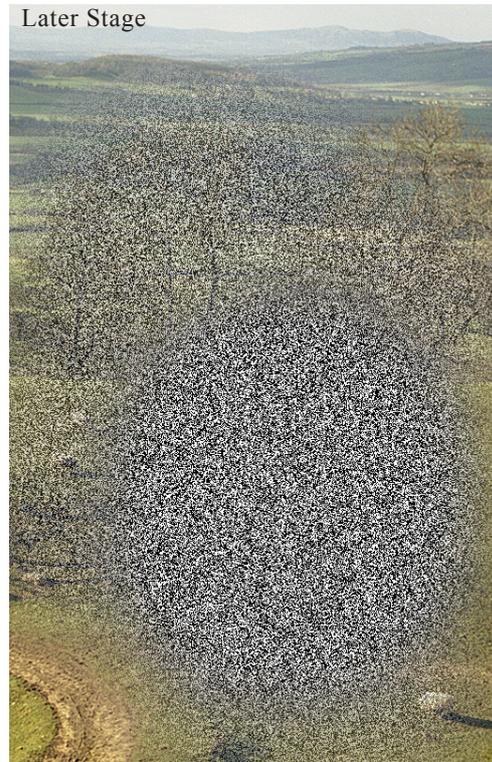
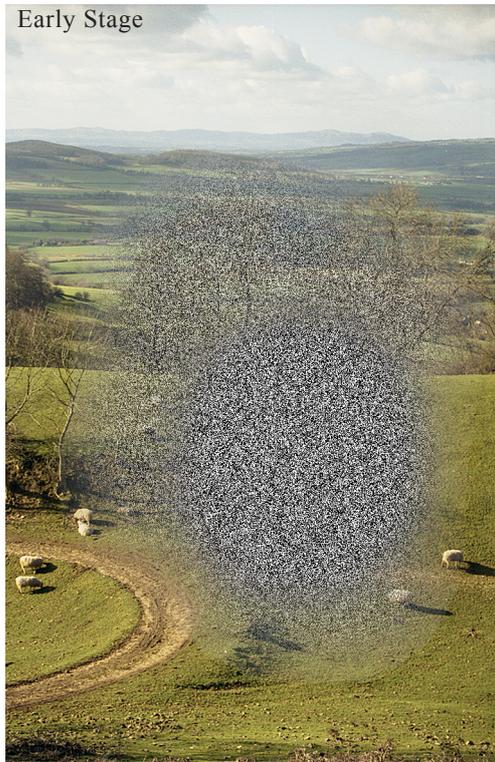
are similar but not the same), though both are often referred to by sufferers as *migraine aura* or *migraine lights*, and can occur – rarely – in both eyes simultaneously. This is a visual effect that precedes or sometimes follows on from a *migraine*, or accompanies a *migraine*.¹⁸ Pertinently, it is sometimes part of a *postictal state* (i.e., post *seizure*). The person will be normal, conscious, and looking say at a house, but then a twinkling noise pattern (like white noise on a television screen that has no signal) will start, sometimes in the centre of the eye(s), or to one side, and grow to encompass the visual field and thereby effectively blind the person, though there may be some peripheral vision. This may be seemingly monochrome, or with some identifiable colour.¹⁹ The attack may last minutes, or up to an hour; in rare occurrences it may last for several days, and in extremely rare instances for years. After an episode of *status epilepticus*, Hilary, my wife, had this condition in the lower right-hand corner of her visual field (no more than around 3–4 percent of the visual field), in the right eye, continuously for six years! It then simply disappeared. If it had been in the centre of her visual field (like Saul?), appearing to encompass both eyes, then she would have been, in practical terms, effectively blind.

What does the account tell us in the Acts of the Apostles? The key passage is when Ananias, several days after the conversion/*seizure* (on the road to Damascus) visits:

So Ananias went and entered the house. He laid his hands on Saul and said, "Brother

18 See, for a brief and succinct definition and description, Wikipedia: *Scintillating Scotoma*: https://en.wikipedia.org/wiki/Scintillating_scotoma and *Retinal Migraine*: https://en.wikipedia.org/wiki/Retinal_migraine

19 Google "*migraine aura*," or "*Scintillating Scotoma*," selecting images, to see the variety and type; these are "photo-shopped" images made by people who suffer from this condition, and are therefore comparable by analogy.



A “photoshoped” picture/graphic showing the effect of *Scintillating Scotoma* and its progress and potential permanency. The scaling pattern will appear to be vibrating with the tiny “scales” moving, like white noise on a TV with no transmission. What is happening is neurological, it is in the cerebral cortex (at the back of the brain, which processes visual input) not in the actual eyes.

Saul, the Lord Jesus, who appeared to you on your way here, has sent me so that you may regain your sight and be filled with the Holy Spirit.” And immediately something like scales fell from his eyes, and his sight was restored.²⁰

Acts 9:17–18b

The key here is the phrase, “something like scales (ὡς λεπίδες).”²¹ Sufferers of *Scintillating Scotoma* or *retinal migraine* have attempted to visualize

20 Ἀπῆλθεν δὲ Ἄνανιας καὶ εἰσῆλθεν εἰς τὴν οἰκίαν καὶ ἐπιθεὶς ἐπ’ αὐτὸν τὰς χεῖρας εἶπεν Σαοὺλ ἀδελφέ ὁ Κύριος ἀπέσταλκέν με, Ἰησοῦς, ὁ ὄφθεις σοι ἐν τῇ ὁδῷ ἣ ἦρχου ὅπως ἀναβλέψῃς καὶ πλησθῆς Πνεύματος Ἁγίου. Καὶ εὐθέως ἀπέπεσαν αὐτοῦ ἀπὸ τῶν ὀφθαλμῶν ὡς λεπίδες ἀνέβλεψέν τε καὶ ἀναστὰς ἐβαπτίσθη. Acts 9:17–18b, *Novum Testamentum Graece*, 346.

21 ὡς λεπίδες (*hōs lepidēs* Acts 9:18): Greek: *lepidēs*, “scales,” “flakes,” from *lepis*, or *lepra*, scaliness (hence leprosy): a literal translation (Nestle-Aland), “And immediately fell from eyes, his, as it were, scales.”

in photographs or drawings the appearance of these *migraine auras*. The pictures produced often look like fine tiny, animated, shimmering, scales that obscure what is being looked at. Saul came face-to-face with the resurrected Christ and survived the encounter, but not unscathed. According to the Hebrew Bible (Exod 33:20; cf. Gen 32:30; 33:23; Judg 6:22; Isa 6:5), Saul should have died: clearly pain, disability, blindness here, is God’s mercy!

Landsborough as we noted assumes that the scales happened as he regained sight. I would cautiously assert than the scales had been in his sight, so to speak, for three days from the point of his conversion. In the case of the apostle Paul, the aura, the visual “scales,” appeared to encompass both eyes, however, what was

happening was not in the eye or the optic nerve, but neurological. The “scales,” the “flakes,” the visual white noise, was in effect, in the cerebral cortex (the back of the brain), the brain’s visual processor, for three days, obscuring all his vision like an eclipse. This we may cautiously assert was perhaps *postictal status* (i.e., a continuous state – after the *seizure* – of *Scintillating Scotoma* or *Retinal Migraine*); he could have remained like this for the rest of his life. But God sent Ananias to heal him not simply out of sympathy but because God had a purpose – a mission – for him, for which he would need his sight.

This attack, one *seizure*, was at a cataclysmic moment in his life, a point of crisis. This *Scintillating Scotoma* or *Retinal Migraine* – in the *plural cortices* (cerebral cortex) –if it was such, may be considered to be an unfortunate side-effect issuing from his encounter with Jesus, which had triggered the *seizure*, phasing between *simple partial* and *complex partial*: in the temporal lobe(s). Such a one-off *seizure* was triggered by an encounter with the Holy Spirit on the road to Damascus; the healing came at the hands of, and from, Ananias in Damascus, who was a channel, or conduit, for the Holy Spirit.

We may compartmentalize symptoms into classifiable conditions/diseases, but these are human structures imposed on the brain and the mind. When sinful humanity meets the divine, then something has to give, deep inside the immense complexity of our brains,²² with the ramifications that the mind is both independent of, yet intimately intertwined with the brain. If an *epileptic* is touched in such a way by the Holy Spirit then the frailty of a brain prone to *epileptic seizures* may result in an attack. A priest-monk of the Community of the Resurrection in

Mirfield, Yorkshire, once commented to Hilary that perhaps God could do more through her with the *epilepsy* than *He* could without it! Hilary wrote about the perplexing question of self: “I still find it strange even now to hear from another what has occurred in *epileptic* activity and have no memory of it whatever; particularly if my behaviour in this state has been bizarre, childlike, or not recognizing self, those around me, or the place, however familiar. It can be terrifying with hindsight.” And again in another letter, “. . . I can’t remember anything. It is akin to living with two selves, the first being God’s gift initially without the *epilepsy*. The second self, that is possibly God’s gift too, with the *epilepsy*, which is totally unpredictable—disturbances from mild to severe can occur without warning, or cancel memory—the first I know of their occurrence is when told, or finding myself in an unknown place which I eventually recognize as say . . . our house.” This element of two gifts, a dual self, can sound disturbing to some but it may be that this is true of all of us, that there are two selves in all of us (Jung spoke often about the shadow self). It is just that in Hilary’s case the *epilepsy* throws this into sharp focus.

A pertinent question a Jesuit priest put to me once was, did the boy in Mark’s Gospel (Mark 9:14-29) continue to have mild *seizures* after Jesus had cast out the demon? For example, mild *petit mal*, *aura*, strange moments, but of little or no consequence? The demon had clearly worsened the boy’s condition, and Jesus, in exorcising may have given *partial* or complete healing to the brain as well as casting out the demon. Grace protects, but we continue in the *Fall* (*simil iustus et peccator*), if through sin we move too far away from the Lord’s grace then we become more subject to the vagaries and vicissitudes of this reality; however, there is also a general debilitation in the aging process

22 It is widely acknowledged by neurologists and scientists that a single human brain is the most complex object/entity in the known universe.

which will mean various parts of our bodies will ultimately fail – including our brains.²³ Why did Jesus not necessarily proffer a complete healing? A complete healing would have caused a catastrophic change of character/personality. A complete physical healing/cauterizing/scar removal would have changed the person the boy’s father knew and loved, and the boy would not have known himself. It is well known that a serious head injury can alter a personality completely. There is no ἀποκατάστασις, no reconstitution, restitution or restoration, no return to the original or “primordial” condition: not this side of eternity. In addition it is now known by neurosurgeons that the removal (operation) of the scarred brain tissue will generate fresh scarring and therefore new *seizures*. What Jesus gave, we may speculate, was eschatological protection from the evil that toyed with the boy’s condition.

9. CONCLUSION

David Landsborough was perhaps too sure simply to dismiss Paul’s recovery of sight (the “scales” dropping from his eyes) as “a metaphor describing a rapid return of vision.”²⁴ The “scales” as such were not a side effect lasting no more than half a minute as he regained his sight, no, it is reasonable to suppose that they were the form and type of his three-day blindness: the scales (ὡς λεπίδες) did not dissolve and recede as he regained his sight, but “fell away” (ἀπέπεσαν), having obscured his vision for three days. In all probability this was a recovery, a healing at the hands of Ananias, of an

23 Octogenarian stroke victims are now routinely prescribed anti-convulsants not because they have been diagnosed as *epileptic* but because the medicines may (1) limit the damage to the area of brain where the stroke happened but also (2) to limit any miss-firing of neurons and synaptic pathways in the stroke-damaged area that could manifest in a *seizure*.

24 Landsborough, pp. 661-62

enduring episode of the condition, which had rendered him effectively blind. Is *Scintillating Scotoma* a form of *epilepsy*? Some neurologists will assert it is, others not, others that it relates to non-*epileptic seizures*. Whatever. But it is neurological and it impairs the functionality of the visual cortex, and as such it is as disabling as a *seizure*. But it is “good” (Gen 1:31) because as a flaw in Saul’s brain it serves the purposes of God: *Elohim, El Shaddai* – Saul’s Hebraic tradition! Given that there appears to be no record of it causing permanent blindness it may be compared to an *epileptic seizure* (indeed many *epileptics* experience this condition). The other examples in the Acts of the Apostles of a disabling illness in Saul/Paul certainly appear to be *epileptic*, but historical diagnoses are fraught with difficulties, and may simply be unprovable: wrong. A diagnosis of *Scintillating Scotoma* can only be conjecture, but it does move the debate away from a hard-and-fast dualistic either-or which has characterised the question of *epilepsy* as part of the Paul’s health limitation in relation to his conversion encounter.

David Landsborough’s aim in his article on the issue of the Paul and *epilepsy* was to show how, “Evidence is offered to suggest a neurological origin for Paul’s ecstatic visions.” However, this raises 3 questions:

1) Was Paul deluded by some neurological malfunction in his brain because, according to scientists, God cannot exist?

or

2) Was God – *Elohim, El Shaddai, YHWH: Yeshua, Mashiach* – the origin and cause of Paul’s conversion, a side effect a side-effect of the “meeting” being neurological?

or

3) Was the neurological event experienced by Saul on the Damascus road, congenital, part of Paul’s brain, and was an integral part of God’s sway?

The Trinitarian Spirit of God *pressed* on the physicality of Paul's brain-mind, the stress of this encounter triggered a neurological condition which was out-of-the-ordinary, beyond the predictable, and therefore may be considered to be miraculous.

The precise nature of Saul/Paul's brain was crucial to God getting through, we might say. The consequences of this neurological event were good (i.e. fit for purpose). Saul was not converted by an *epileptic seizure*, but the evidence points to certain neurological characteristics (i.e. *seizure* related) being *crucial* and *precise* in the event of his conversion: the *detail* and *providence* is too much to dismiss, the *precision* is, we might assert, *awesome* – too much and he would have been blinded and perhaps mentally disabled for life, brain-damaged irretrievably, or dead; too little and he would have dismissed the event and carried on in his persecution of Christians, the change would have been insufficient.

Why *epilepsy*? Why a breadth of apparently disabling neurological conditions across his life? Because there was immense and intense, value, eschatologically, in them: Saul, then Paul, experienced these conditions, which then came to a head with his conversion encounter, these neurological events were crucial to the person and missionary he became, and for that matter, for salvation history. The Damascus Road *seizure*/neurological event forced Saul into a life-changing situation, demonstrated by his name-change. He became an outsider: ostracized by the fledgling Jewish-Christian community, feared by them; hunted down by his Pharisaic community and by the Sanhedrin as a traitor. What he experienced was a near-death event: God's judgement. *Epilepsy* is both a medical

and mystical tradition.²⁵ The years spent away from Jerusalem and Damascus following his conversion were essential for reflection, healing and recovery, before being called to his mission! *Epilepsy* can sometimes be devastating, at other times enlightening. Therefore the Damascus Road *seizure* was crucial and central to this crisis in his life, but also for the rest of humanity: the encounter on the Damascus road was a neurological response to a meeting with God's salvation, the anointed Hebrew saviour, the resurrected *Yeshua Ha Mashiach*.

25 Where mystery is an "incomprehensible certainty" not an "interesting uncertainty," wrote Gerald Manley Hopkins in a letter to his friend Robert Bridges. See Catherine Phillips (ed.), *Gerard Manley Hopkins, Selected Letters* (Oxford: Oxford University Press, 1990), pp. 169-70, 194

BIBLIOGRAPHY

- Alison Motluk. “Touched by the Word of God,” *New Scientist*, No. 2107, Nov 8, 1997. See, <https://www.newscientist.com/article/mg15621071-000-touched-by-the-word-of-god/>
- Altschuler, E.L. “Did Ezekiel have *Temporal lobe epilepsy*?” *Archive of General Psychiatry*, Vol. 59 (2002), pp. 561-562.
- Bartholin, T. “On Diseases in the Bible: a Medical Miscellany.” (Translated from the Latin by J. Willis. Edited with an introduction by J. Schioldann-Nielsen and K. Sorensen) *Acta Scientific Medical Sciences*, Vol. 41 (1672), pp. 1-147.
- Brazier, P.H. “Towards an Understanding of the Ontological Conditions issuing from Original Sin,” in *The Heythrop Journal*, Vol. 60, No. 5, September 2019, pp. 739-768.
- Brazier, P.H. *Dostoevsky: A Theological Engagement* (Foreword, Murray Rae), Eugene, OR: Pickwick Publications, Wipf and Stock, 2016).
- Bullock, J.D. “The Blindness of Paul.” *Ophthalmology*, Vol. 85 (1978), pp. 1044-53.
- Coles, Alasdair. “*Temporal lobe epilepsy* and Dostoyevsky Seizures: Neuropathology and Spirituality.” Published online, *Royal College of Psychology*, 2013: <https://www.rcpsych.ac.uk/pdf/Alasdair%20Coles%20Temporal%20lobe%20epilepsy%20and%20Dostoyevsky%20seizures.pdf>
- Graver, Margaret & A.A. Long. *Letters on Ethics: To Lucilius*. Chicago: University of Chicago Press, (2015)
- Hippocrates of Kos. *The Law, Oath of Hippocrates, on the Surgery, and on the Sacred Disease*. (Francis Adams translator), Gloucester (UK): Dodo Press, 2009.
- Hopkins, Gerard Manley. *Selected Letters* (edited, Catherine Phillip), Oxford: Oxford University Press, 1990), pp. 169-70, 194.
- Kottek, S.S. “From the history of medicine: *epilepsy* in ancient Jewish sources.” *Israeli Journal of Psychiatry and Related Sciences* Vol. 25 (1988), pp. 3- 11.
- Landsborough, D. “St Paul and *Temporal lobe epilepsy*.” *Journal of Neurology, Neurosurgery & Psychiatry*, Vol. 50 (1987), pp. 659-664.
- Levin, S. “St. Paul’s Sickness.” *Proceedings of the Royal Society of Medicine* (archive), Vol. 9 (1963), pp. 264-5. See: <https://www.ncbi.nlm.nih.gov/pmc/journals/269/>
- Manchester, P.T. “The Blindness of Paul.” *Archives of Ophthalmology*, Vol. 88 (1972), pp. 316-21. See *JAMA Ophthalmology*, <https://www.medscape.com/viewpublication/2787>
- Novum Testamentum Graece*. Stuttgart: Deutsche Bibelgesellschaft, 1993.
- Petre, Jonathan & Jonathan Wynne-Jones. “St Paul Converted by *Epileptic* Fit, suggests BBC.” *The Daily Telegraph*, April 19, 2003. See: <https://www.telegraph.co.uk/news/uknews/1427916/St-Paul-converted-by-epileptic-fit-suggests-BBC.html>
- Ramachandran, Vilayanur, *The Emerging Mind: The BBC Reith Lectures*. London: Profile Books, 2003. See also, https://en.wikipedia.org/wiki/Reith_Lectures#2000s
- Reik, Theodor. “The Study on Dostoyevsky,” in *From Thirty Years with Freud* (New York: Farrar and Rhinehart, 1940), 158-76.
- Rosen, Nathan. “Freud on Dostoevsky’s *Epilepsy*: A Revaluation,” *Dostoevsky Studies* Vol. 9 (1988) pp. 107-25.

Rosner, F. "Neurology in the Bible and Talmud." *Israeli Journal of Medical Science*, Vol. 11 (1975), pp. 385-397.

Ross, J.M. "Epilepsy in the Bible." *Developmental Medicine & Child Neurology (DMCN)* Vol. 20, (1978), 677-678.

Schweitzer, A. *The Mysticism of Paul the Apostle*. London: Adam & Charles Black, 1967, p. 152.

Selby, D.J. *Towards the Understanding of St. Paul*. Englewood Cliffs, New Jersey: Prentice Hall (1962), pp.145-8.

Stern, A. "Zum Problem Der Epilepsie Des Paulus." *European Neurology* (originally published in *Pschiatric Neurology* Basel), Vol. 133 (1957), pp. 276-84.

Stirling, J. *Representing Epilepsy: Myth & Matter*. Liverpool: Liverpool University Press, (2010).

Vercelleto, P. "Saint Paul disease. Ectasia and Ecstatic Seizures." US National Library of Medicine & National Institute of Health. See: <https://www.ncbi.nlm.nih.gov/pubmed/7676119>

Williams, D. "Temporal lobe epilepsy." *British Medical Journal* (11 June 1966, 1:5501), pp. 1439-42.

Williams, D. "Temporal Lobe Syndromes." Vinken P.J. & Bruyn G.W. (eds.) *Handbook of Clinical Neurology*, Vol 2 (1969). Amsterdam: Elsevier, pp. 700-24.