Highlights of the first fifty years of our Real Time Club.

Our club was launched by a group of computer entrepreneurs in June 1967 to press the government to improve the telecommunications infrastructure to enable us to connect terminals to our mainframe computers, on-line in REAL TIME. We have regularly dined together ever since to debate the leading edge of computing with world leaders in science, industry and government.

In the early 70's we campaigned for a UK internet, and eventually the Joint Academic Net, or JANET was set up, but only for use by universities! We were instrumental in the establishment of the Central Computing Agency, and organised many events to explain the concept of software. In the early 80's very few people believed that the public would soon have 'micro' computers in their homes. The club dug in for a long hard uphill battle to get computers into schools, and eventually succeeded in getting computing into the national curriculum in 2015! In 1993 the club initiated the Joint Advisory Panel on Information Technology in Education (JAPONITE). In 1998 an inaugural conference was held with the Royal Society to advise school governors on setting up school IT networks.

Over the fifty years everyone has grumbled at the paucity of venture capital in the UK. Few have been aware that since the Prevention of Frauds Act 1936, it has been a criminal offence for anyone to solicit investment funds other than a 'qualified person' or, bank. Few qualified persons would take the risk, so most doors stayed firmly shut. In 1997 the new government planned a new Finance ACT. Members caused uproar. The Treasury explained that no one ever dares reduce red tape: the clause must remain [It is clause 20 in the new Act]. Over dinner members suggested 'sophisticated investors' should be exempt. A member, previously legal counsel to the stock exchange, drafted a clause which the Treasury cut and pasted into the consultation papers. No one objected and it was duly incorporated into the Financial Services and Markets Act 2000.

The 'sophisticated investor exemption' has been essential for the success of crowdfunding.

The club had been keeping an eye of the rise of quantum computing following David Deutsch's paper to the Royal Society. Club members suggested formal research should be funded by the European Commissions' Long Term Research Unit. Its Director, Simon Bensasson was invited to dinner, which led to the Quantum Computing in Europe Pathfinder Project, in which eighteen countries participated, chaired by a Club member. In 1999 34m Ecu was allocated to quantum computing and cryptography in the Vth framework.

Members have carefully followed the fortunes of Artificial Intelligence (AI) over the years. Early in the new century the Club initiated a series of dinners and events at the Royal Institution, with leaders of the Cognitive Neuroscience community. In 2010 The Club launched the Brain Mind Forum http://brainmindforum.org/appendices.html and, following in the footsteps of Hilbert's Questions for mathematicians in 1900, published a list of '21 Questions for Cognitive Neuroscience for the 21st century' in conjunction with the New Scientist.

True to form, while the scientific community is spending large sums of money trying to design intelligence into computers, the Brain Mind Forum is doing the opposite, and is helping to put together a team of world leading philosophers, proponents of the role of art and creativity in intelligence and the 'whole body hypothesis', plus our fifty years' experience of inventing computing to better understand human intelligence, and try and identify, describe and, even perhaps begin to define what intelligence actually is.

Members lecture widely on the convergence of biogenetics, cognitive neuroscience and computing, science in art and creativity in computers, dyslexia, autism and crowdfunding. In the last year members have dined listening to the younger generation telling us about the advances they are making in biogenetics, prosthetic computing, robotics, synthetic biology and genetic engineering; and the ethical questions these developments will raise in the next fifty years...... or possibly much sooner!

The Club has no rules, no hierarchy and everyone is welcome. We have published 'With Great Respect' a History of the Real Time Club <u>www.RealTimeClub.co.uk/History</u>.