

Sustainable History – an appraisal

Daniel Krämer, Stephanie Summermatter

It was on a Sunday in the early 1970s [1972] that a well-known professor of history at the University of Bern made a mistake. Christian Pfister and his wife Rita went on a trip to the “Gurten” hill, and their two-year-old son Lorenz was strapped to his back in a carrying frame. When Christian Pfister met the professor and sketched him the content of his dissertation, he decided: "That's impossible!" There was no connection between the course of the weather and the agricultural economy. Georges-Andre Chevallaz, the later Federal Councillor, had already failed in his careful dissertation in an attempt to demonstrate this. "My wife was shocked when she heard this," Christian Pfister recalls to this day.

That same evening, he decided not to give up his plan. "I was convinced that it was possible." This anecdote illustrates how Christian Pfister went his way in the following decades: with perseverance, a little bit of doggedness, a wealth of ideas and a fine sensorium for technical and scientific progress that allowed him to approach his goals step by step. He never failed on his way, even though he seldom followed old trails and sometimes moved on a narrow ridge.

Contours of a research career

Looking back, the dissertation “Agrarkonjunktur und Witterungsverlauf im westlichen Schweizer Mittelland zur Zeit der Ökonomischen Patrioten at the time of the economic patriots 1755-1797” (Bern 1975) was the first large-scale idea that Christian Pfister was able to implement. He once called it "the first step towards utopia". Although its realisation raised new questions, required differentiations in the results and necessitated an extension of the period under study, up to this point no one had ever linked climatic, economic, social and demographic processes. In the course of time, the dissertation became a script, the elements of which Christian Pfister repeatedly supplemented, adapted, differently assessed and revised.

Christian Pfister first came into contact with climate research during his time at the Institute of Geography, first as a student from 1966 to 1970 and later as assistant to Professor Bruno Messerli from 1969 to 1975. Messerli had already focused his research on the interactions between humans and their natural environment at a time when ecological questions were scarcely a topic of

debate. He always took climate into account in his research, and his assistants in the early 1970s followed his example. With one exception, they all devoted themselves to climate research: Heinz Wanner, Hans Kienholz and Heinz J. Zumbühl at the Institute of Geography in Bern, Matthias Winiger at the University of Bonn. Only Hans Hurni turned to development aid at the Institute of Geography in Bern.

With the help of a National Science Foundation grant, Christian Pfister was able to carry out research stays with the economist Stanley Engerman in Rochester NY (USA, 1976) and with the pioneer of historical climate research, Hubert Horace Lamb, in Norwich (UK, 1977). Here he refined his methodology and acquired the knowledge for the development of databases, which became an important basis for his research. He devised a codebook, wrote several software programs in the then common program language PL/I and began to process the data electronically for his habilitation thesis. From a simple file called Clim-Hist the database Euro-ClimHist <http://www.euroclimhist.unibe.ch/en> developed from the 1990s. Today [2019] it contains over 200'000 entries from several countries of Europe. Since 2010, it is supported by the federal government as part of the Global Climate Observing System (GCOS).

Parallel to ClimHist, Christian Pfister built up a database named BernHist database from 1984. The starting point was a pilot project supported by the Bern Department of Education to record baptisms and deaths in the church records in the canton. In 2009 the database contained about 1.5 million individual data from the fields of population, economy, environment and politics for the period from 1700 to the present. It was accessible to the public on the internet platform DigiBern (www.digibern.ch). In 2011, DigiBern ceased further support without justification.

The creation of the two databases influenced not only the work of Christian Pfister, but also his lifestyle. At the beginning of the digital age, workplaces with screens were a rare commodity at the University of Bern, and those who took a longer break had to leave their seats to others. Only a short walk to the toilet was allowed. In order to be able to use the screen as long as possible, Christian Pfister began eating only two apples at noon - a habit he has retained to this day.

From 1978 to 1981, Christian Pfister worked as a patented teacher at the Kreuzfeld secondary school in Langenthal and also completed his habilitation. In 1981 he was employed as a senior assistant and from 1982 as a private lecturer at the Historical Institute at the University of Bern. In 1988 he was appointed part-time associate professor, and in 1990 he was awarded a research

professorship for environmental and regional history by the Swiss National Science Foundation. When it expired in 1996, Christian Pfister successfully applied to succeed professor Beatrix Mesmer on the chair of recent Swiss history. However, he opted for the option offered to him of retaining his previous research focus and being promoted to full professor.

In 1997 he was appointed an extraordinary professor and in the same year a full professor, but initially without the slightest staffing. In the following years he had to fight for some staff with moderate success.

In 1998, Christian Pfister named his section "WSU" which is an abbreviation for "economic, social and environmental history." These are known to be the three criteria of sustainability i.e.: social and ecological compatibility coupled with economic efficiency. It was not foreseeable at that time that the WSU department would slowly develop into a flagship of the University of Berne. WSU was not committed to any particular dimension of sustainability. Rather, it functionally combined economic, social and environmental historical aspects and attempted to explore new thematic fields on this basis. It is precisely this thematic breadth and the need for interdisciplinarity that were and are characteristic of WSU. Especially interdisciplinarity was always cultivated by Christian Pfister: On the one hand, his teacher Bruno Messerli had put it into his cradle during his time as an assistant at the Institute of Geography, on the other hand, as a historian and geographer trained in pedagogy, he repeatedly built bridges to the social and natural sciences. At a time when interdisciplinarity had not yet been propagated from all sides, this bridge could have turned out to be a dead end. While he worked too quantitatively for the humanities, he was too descriptive for the natural sciences. Christian Pfister did not seem to have a real scientific home for a long time, and it took years before he was accepted by his own guild.

The struggle for recognition did not dampen his enthusiasm. Rather, Christian Pfister transferred it to teaching and his students. With his spirited manner, facial expressions and gestures, he not only conveyed history with lasting effect, he also filled it with life. Particularly worth mentioning in this context is the lecture cycle on population history, agricultural, industrial and consumer society, in which Christian Pfister could hardly rely on textbooks and which he completely redesigned. The large number of listeners filled him with pride: between 120 and 200 students attended the lectures. For him, it was a sign that the lectures provided a knowledge base that was offered neither in a preparatory school nor in any other form at the university. Even outside the lectures, he was always able to inspire and motivate students for "his" topics. He was well aware

that he was just as polarised as he was in science. But anyone who was once convinced of him attended his courses again and again.

During his almost twenty years at the University of Berne, Christian Pfister supervised 150 licentiate and master theses, 26 dissertations and two postdoctoral theses. As with his own research, he paid attention not only to the reconstruction of the scope of action of the various social groups, but also to the ability of the results to relate to the major questions of the present: they were intended to illustrate the relevance of history for contemporary society. Student works were therefore never an end in themselves for him. From the very first work in his undergraduate studies, they could be valuable research results, although they often resembled uncut diamonds.

The topicality and connectivity of his own results were soon no longer doubted, even though pure historians or pure natural scientists sometimes still underestimate him today. The extent to which Christian Pfister's results also appealed to and reached the general public was demonstrated not only by his participation in numerous community histories in Bern, but also by his large media presence, which began as early as the 1980s and reached a climax after 2000 with discussions about the millennium summer of 2003 and the floods of the century. In addition to expert appearances in Swiss news programmes and radio reports, Christian Pfister has also been a guest on several Swiss television debating programmes, in which hard rhetorical bandages were often used in connection with natural disasters and climate change.

The national and international recognition that Christian Pfister has earned over the years can be seen on several levels. On the one hand, the University of Bern awarded him the Theodor Kocher Prize in 1986 for his innovative achievements as a young researcher; on the other hand, he received the Eduard Brückner Prize in 2000 for his "outstanding interdisciplinary achievements in climate research". His appreciation can also be seen in his participation in numerous interdisciplinary projects. In 2001-2009 Christian Pfister was project leader at the National Centre of Competence in Research on Climate (NCCR Climate) of the Swiss National Science Foundation and in 2006-2010 he was research partner of the EU project "Millennium - European Climate of the last Millennium". His contribution lies in particular in research into the climate of the Middle Ages (1000-1500). Only in recent years has climate history emerged from the blind spot of public awareness in the course of the global climate debate. In the 1970s, Christian Pfister recognized that observing nature and the environment is much more than the rules of farmers, which are often anchored in public consciousness, express. He did not stop at reconstructing and analysing

climatic conditions, but also looked into the question of how societies of past epochs faced the challenge of changing climatic conditions. In view of the current challenges of climate change, his historical insights provide insights into possible response patterns and coping strategies.

Climate history

Already in his dissertation, Christian Pfister linked climatology and historical sources by using climate data to demonstrate the influence of weather and climate on the agricultural economy of the 18th century. He also contributed data on crop quantities, crop prices, areas under cultivation and demographic factors. In his habilitation thesis *The Climate of Switzerland from 1525 to 1860 and its Importance in the History of Population and Agriculture* (Bern 1984, 3rd edition 1988) he refined his methods of climate reconstruction. Even today, his methodological considerations are regarded as path breaking, and his multi-layered approach was ahead of the simple deterministic studies of the time. With the publication “*Wetternachhersage*”, i.e. weather hindcast. *500 Years of Climate Variations and Natural Disasters 1496-1995* (Bern 1999), which was produced in close collaboration with climatologists Heinz Wanner and Jürg Luterbacher of the University of Bern, Christian Pfister later reached a wider audience. The seven-stage scales for temperatures and precipitation allowed weather data for each month since 1496. With the centuries-long period of investigation, the boundaries between pre-instrumental and instrumental time as well as between purely natural and human-influenced climate could be overcome in one and the same study, which is why weather hindcast also made an important contribution to the discussion about whether anthropogenic climate warming can be demonstrated.

In addition, Christian Pfister was responsible for numerous other anthologies, methodological work on problems and potentials of historical climatology as well as special contributions on climate history, of which only the anthology *Climatic Variability in Sixteenth Century Europe and its Social Dimension* (together with Rudolf Brázdil and Rüdiger Glaser, *Climatic Change, Special Volume*, 1999) should be mentioned.

Nature induced natural disasters

The study of climate led Christian Pfister in the 1990's to a new field of research: the step from climate to extreme climatic events to nature induced

disasters was a logical one, since it was the extreme events and disasters that for centuries had found the most detailed written expression. The “Wetternachhersage” (weather hindcast) (1999) marked the first major step in linking climate variations and nature induced catastrophes, as it covers not only the climate anomalies of the past 500 years but also the most severe nature induced catastrophes of that period. Christian Pfister's involvement with catastrophes has been reflected in his teaching on several occasions, which has borne fruit in the form of a wealth of student research projects. In the anthology “The day after. Coping with natural disasters in Switzerland 1500-2000” (Bern 2002) some of them are outlined. The two synthesis contributions by Christian Pfister as editor summarise his theses on the significance of historical natural disasters for the development of affected societies and serve as introductory articles to the topic area. Christian Pfister postulates that natural disasters can be regarded as pacemakers of modernization and were fundamental for the development of national solidarity, at least in Switzerland.

This was particularly the case in the 19th century, when wars in other European countries promoted the formation of a “we” consciousness, but also in earlier centuries, when communities supported each other with the right of reciprocity in coping with disasters. With these theses he succeeded in giving a new depth to the primarily cultural-historical discussion about the interpretation and perception of catastrophes. In addition, he made clear the value of historical disaster studies for modelling and simulation of the climate. Not least with this publication, Christian Pfister helped to establish climate history and historical natural catastrophe research in historical science, which had hitherto regarded disasters as singular events outside historical development and not worthy of research.

Regional history as “histoire totale”

Both Christian Pfister's dissertation and his postdoctoral lecturing qualification were committed to the “histoire totale” of the Annales School in addition to climate history. The focus on Bern and the economic patriots opened up a field of regional history that continued to occupy him in the years that followed. Many parts of the Swiss territory consist of a finely structured patchwork of landscapes of the most varied character. Bern is no exception. Here the rooms also followed different paths in their development. Christian Pfister's monograph “Im Strom der Modernisierung” (Bern 1995) showed how difficult generalizing statements in this area are. This was remedied by the BernHist database, which

was closely linked to the development of the book and thus clarified its value for research. It was not least thanks to this database that Christian Pfister was able to refute theses that were in part firmly anchored in specialist literature. Beyond its regional historical significance as volume four of the history of the Canton of Berne since 1798, the monograph has also been widely received internationally: as pioneering work that implements the methodological postulate of a total *histoire* with extraordinary precision and spatial-temporal differentiation; and as a material history in the best sense of the word, in which energy sources and food, agricultural production methods and their modernization appear just as much as the "people who give birth and give birth, eat, work, argue, invent, try out, age and die, and are not merely processed into statistical series of numbers". The stream of modernisation was the result of more than ten years of project work, in which numerous licentiate theses and dissertations were incorporated. On the one hand, the monograph addressed a wealth of different aspects; on the other, it was the basis for further processing of the BernHist data. The collaboration with Hans-Rudolf Egli of the Geographic Institute of the University of Bern and the support of 46 other authors resulted in a historical-statistical atlas of the Canton of Berne 1750-1995 (Berne 1998), which became a model for the graphical implementation of quantitative historical data. In particular, the accuracy of detail and temporal depth of the atlas opened up new perspectives on Bern's spatial structures. Christian Pfister was also able to introduce a different point of view in the history of the German-speaking population. Unaffected by the difficult legacy of population history in Germany after the Second World War, he was able to address the topic. Since Erich Keyser's *Population History of Germany* (Leipzig 1938, 3rd edition 1943) no synthesis was written for the Early Modern Period. At the beginning of the 1990s, Christian Pfister took on the task of collecting and compiling an almost unmanageable number of small-scale, at best regional and heterogeneous studies of half a century and pressing them into the framework of a volume of the *Encyclopaedia of German History*. Although new findings could not be sufficiently discussed and complex problems only hinted at, the volume *Population History and Historical Demography 1500 - 1800* (Munich 1994, 2nd edition 2007) met with a positive response.

The 1950s Syndrome (Energy and Transport)

By dealing with the transition from an agrarian to an industrial society and with the social adaptability of the time, Pfister opened his eyes in the anthology "The

Silent Countdown (Bern 1990)" to possible solutions to today's environmental problems and thus strengthened the still young history of the European environment in which he was decisively involved as a pacemaker of today's European Society for Environmental History (ESEH). This examination of the transformation from an agricultural to an industrial and finally to a consumer society led to Christian Pfister's most controversial book, *Das 1950er Syndrom* (Bern 1995, 2nd edition 1996). His thesis of an epochal threshold, which was triggered by the collapse of prices for fossil fuels and has since helped shape society, the economy and particularly the ecology, attracted a great deal of media attention. Although the interdisciplinarity of the anthology was acknowledged in specialist circles, the discussion hoped for by Christian Pfister and a thoroughly possible differentiation of the thesis largely failed to materialise. Nevertheless, the book did not remain without a long-term effect. On the one hand, Rolf Peter Sieferle, Fridolin Krausmann, Heinz Schandl and Verena Winiwarter once again took a critical look at the thesis in "Das Ende der Fläche" (Cologne 2006) and attributed it a certain plausibility. At least in one of her models, economic growth after 1950 was based on the use of new energy sources.

This transformation process was at the same time the end of an agriculture that had still relied heavily on solar energy. On the other hand, Patrick Kupper coined the term "1970o diagnosis" (2004) based on the metaphor of the "1950s syndrome". Like Christian Pfister, he recognized an epochal threshold in the changed use of energy resources. Starting with the 1950s syndrome and the development towards the history of consumption, Christian Pfister presented another anthology of student works, *Bilder vom besseren Leben* (Bern 2002), in which "Werbung Geschichte" (Advertising History), a book of pictures of the better life, was published in 2002.

told". This and numerous events on the history of energy and transport also show that he did not leave the 1950s syndrome lying fallow, but was able to inspire in his teaching.

Commemorative publications ("Festschriften") are often suspected of being an outmoded hero worship. This criticism is often justified. On the other hand, Festschriften can also provide insights, reflect discourses and point out connections. And they can draw lines from the inspiring teacher to his students. In short, they are a friendly-critical confrontation with the work of a colleague, teacher or mentor. This commemorative publication, which we have compiled for the retirement and 65th birthday of Christian Pfister, may be no more or less. For the editorial team, it was clear that Christian Pfister's four main areas of

research were to be represented in the commemorative publication. On the one hand, we wanted to win recognized representatives of their subject and long-standing friends for cooperation, and on the other hand, we wanted his students to have their say. We succeeded in both. The title Sustainable History can be understood in two ways. On the one hand, Christian Pfister's research in many areas has a lasting effect both within and outside the subject boundaries. On the other hand, "sustainability" represents a central perspective with which he and the WSU Department interpret the past: What developed in the 18th century as the idea of a generation-spanning forest prevailed in the late 20th century as the guiding principle for economic development.

(translated and complemented from Daniel Krämer, Stephanie Summermatter, „Nachhaltige Geschichte. Eine Einleitung“, in: Andre Kirchhofer, Daniel Krämer, Christoph Maria Merki, Guido Poliwoda, Martin Stuber, Stephanie Summermatter (Eds.). Nachhaltige Geschichte. Festschrift für Christian Pfister. Zürich (Chronos) 2009, 11-20).