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THE NUCLEAR CONSPIRACY

**FRG collaborates
to strengthen
Apartheid**

SPECIAL ISSUE

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Fight the nuclear conspiracy between West Germany and South Africa

'It is a sordid tale - of four great and rich Western powers, each of which in public protests its detestation of racialism, colonialism and apartheid, and each of which in practice is competing with the others for the profits these evils produce. Britain and America impose sanctions on Rhodesia - France and West Germany defy them; Britain and America place an arms embargo on South Africa - France and West Germany stab them in the back. And yet an ugly suspicion arises that the role of the defiers, though superficially antagonistic, is not really contrary to broader imperialist strategy at all ...'

from GREAT POWER CONSPIRACY p. 42 - published by the ANC (1966)

(...especially in view of the Southern African policy of the United States, as enunciated in its infamous Memorandum 39 wherein it is committed to support the white racist regimes of Ian Smith and Vorster, and Britain's continued use of Simonstown from which base her navy regularly holds joint naval exercises with the South African Navy... Edo)

The continuing and increasing supply of modern weapons by the leading imperialist countries to the apartheid regime; the drawing in of the Vorster regime into NATO's aggressive schemes;

the recent West German admission that certain West German industries are constructing an uranium enrichment plant and nuclear reactors for South Africa are all matters which should cause grave concern for all those who desire world peace and security.

The international community has watched with increasing disquiet the growth of South Africa's armory of conventional weapons and the development of a locally-based armaments industry aided by the United States, the Federal Republic of Germany, Britain, France and Italy.

The recent exposure by the African National Congress of South Africa of the close nuclear collaboration between the Federal Republic and the South African apartheid regime by the publication of their document 'the Nuclear Conspiracy' which is reproduced in full in the following pages, clearly shows the speed with which racist South Africa is moving towards becoming a nuclear power..

The Federal Government at first denied any cooperation with South Africa in the field of nuclear development. It then tried to divert the attention of the world by getting one of its generals to resign. Finally, it accepted that an uranium enrichment plant and nuclear reactors are being built by West

German companies for South Africa (a selection of reports from the West German press published at the end of this issue show this up all too clearly). The Federal Government argues, however, that these are being done by private companies and that the Federal Government could not interfere with private enterprise.

We challenge this conception, or, rather should we say, deception.

In the first instance no German company could export any strategic material without an export licence issued by the Federal government. Because of the high risk involved in exporting such material as we show in our document, no company will take the chance of exporting to South Africa without, what is known as the Hermes guarantee which has to be issued by the Federal government.

The Kraftwerk-Union which has undertaken to build South Africa's nuclear reactors recently requested the Federal government to insure them under the Hermes guarantee that they will be granted an export licence when they complete their work.

We pointed out at a press conference in Bonn on October 8, that if the Federal government is really not involved

in cooperating with the racist South African regime let them 'today reject both these requests by Kraftwerk Union'.

The West German company STEAG which is building the uranium enrichment plant for South Africa is closely linked with the Federal government.

In the diagram on page 18 of our document we clearly show just how much control the Federal government has with STEAG. Let us give just one area through which this control comes.

The government of the FRG has a 40 % share in the Ruhrkohle AG and Ruhrkohle has 51 % shares in STEAG. This is not all. Ruhrkohle receives a government subsidy of 520 million dollars a year ! Can there be any doubt on these figures alone of the Federal government's heavy involvement with South Africa through STEAG ?

Let us take this a little further and deal with another murky aspect of this episode: At a time when Ruhrkohle is closing down collieries and laying off German miners, Ruhrkohle - heavily subsidised by the Federal government in order, it is said, to protect the jobs of German miners, will from 1976 be importing 2 millions tons of coal from South Africa because, as is well known, it is cheaper for them to import coal from South Africa than to mine it in the Republic because of the slave labour conditions of the black mine workers in South Africa.

In the military field also there is extremely close cooperation between the FRG and racist South Africa.

We have copies of a hand-written document in which a Mr. Thoenges, a coding expert with the Military Attache at the South African Embassy in Bonn writes that the company MAN, in Nuernberg, has received an order to produce turbines for ESCOM and that he was making NATO codings on these turbines in cooperation with the Bundeswehr.

A representative of the ANC phoned MAN - Nuernberg pretending he was Mr. Thoenges and obtained the information that such an order was placed on September 11, 1974. Meanwhile, scientists from the Nuclear Research Center in Jülich, FRG, have told us that South Africa had really

ordered compressors from MAN and from their construction it was clear that these were for a jet-nozzled Uranium Enrichment Plant.

However, MAN repeatedly denied having such an order. But on September 20, a spokesman for MAN confirmed the order for compressors for South Africa in a telephone interview with a representative of Associated Press.

It is not without significance that Admiral Biermann, head of the South African Armed Forces visited Nuernberg, where MAN is situated on November 9, 1974 soon after the order for compressors was placed.

We also have detailed documents of meetings held in 1965, 1967 and 1968 of the nuclear suppliers group which include South Africa, the Federal Republic, France, Britain and the USA. These documents are being processed by our Research Department and may be prepared for publication later.

Some government ministers in Bonn use the argument that the constructing of the South African uranium enrichment plant helps the West German export trade, and also opens up employment prospects for our people. We shall dismiss the second reason with the contempt it deserves, because almost all workers in such a sensitive area will most certainly be white. In reply to the first contention, the construction of this plant will help South Africa to compete with the Federal Republic in supplying the Western world with enriched uranium.

Why not construct this plant in the Federal Republic ? The answer is simple: it is uneconomic. It will eat up too much energy which the Federal Republic could ill-afford. In South Africa, on the other hand, because of its slave labour policy, energy is produced at a fraction of what it costs to produce elsewhere.

Coming back to the jet-nozzled system for enriching uranium we note that this system was developed by the Gesellschaft für Kernforschung (GfK), a government institution, and STEAG could not produce this system without the Federal government's prior permission. So the conspiracy is complete.

We are quite certain that today no company in the Federal Republic will invest in South Africa without insurance under the Hermes guarantee or without

some knowledge that they will get export licenses - both from the Federal government. With the death of Portuguese colonialism they have not only seen the writing on the wall in so far as the whole of the Southern African situation, they have read it !

The balance of forces in Southern Africa has dramatically changed with Mozambique's independence; with Angola moving towards independence, with Ian Smith in grave trouble; with South Africa on the rack of world opinion on Namibia and the growing revolt inside the apartheid laager.

No businessman risks his neck in the situation that now obtains in South Africa. He needs guarantees. And, in the Federal Republic such guarantees are available. They are available from the Federal government. And, therefore, the Federal Government could not escape its responsibility in the conspiracy.

We do not have to draw the attention of our readers to the grave danger these developments present to independent Africa and indeed to the whole world.

Once racist South Africa becomes a nuclear power, one does not have to stretch one's imagination too much to realise that the apartheid regime will use its position to threaten and blackmail Africa. Already, it is blatantly infiltrating its armed forces into Angola in support of counter revolutionary elements within the country. There can be no doubt that this process will be repeated against all governments in independent Africa who express their abhorrence of apartheid, racism, colonialism and imperialism.

In the name of the people of South Africa, the African National Congress demands that the Federal Republic of Germany, France, the USA, Britain and other countries forthwith desist from proping up the apartheid regime through their financial and technical assistance to make white South Africa a nuclear power and to end forthwith the supply of arms and military technical know-how to an avowedly fascist regime. We urge all our readers to support this demand and to propagate and work for its implementation, wherever possible, in the interests of world peace and security.

October 30, 1975.

Declaration on South Africa's militarisation

A Seminar on South Africa's Militarisation, held in Brussels on 18 and 19 October 1975, with the participation of representatives of a number of democratic organisations, Southern African national liberation movements and United Nation bodies adopted the following Declaration ...

The South African regime is continuing its illegal and highly militarised occupation of Namibia. It has established many new military bases in the territory, in addition to the large Air Force base in the Caprivi Strip, and has set up a sub-station at Walvis Bay as part of the Advokaat communications systems.

Fifteen years ago, after the Sharpeville massacre and the attainment of independence by a number of African states, the racist and colonialist regime in

South Africa embarked on a plan for massive military expansion.

This was the result of the failure of the South African regime to suppress the struggle for national liberation in the country, despite the ruthless measures of repression, and its inability to stem the tide of African liberation in collusion with the most reactionary elements in the colonial powers.

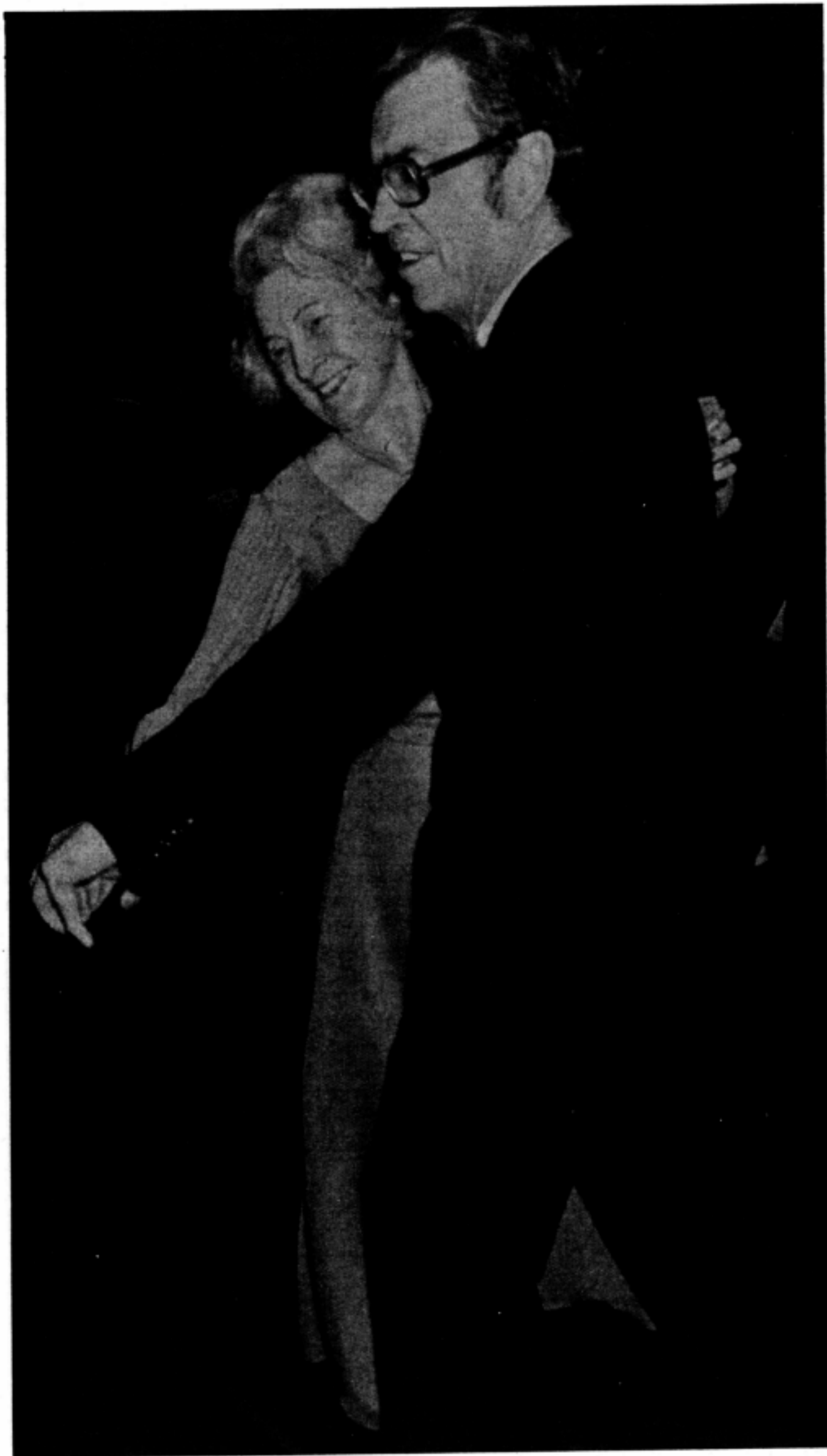
The programme of militarisation, ac-

companied by a reign of terror within the country, had four main aims:

- to counter the liberation movement which was obliged, because of the terrorist measures used by the South African regime to undertake an armed struggle to secure national liberation;
- to threaten independent African States and prevent assistance by them to the struggle for national liberation



The Royal Navy task force exchanged crests with the city of Cape Town during the recent joint sea exercises with the South African Navy in Cape waters.



Donald B. Sole with Erna-Maria Leber

in South Africa, Namibia, Zimbabwe, Angola and other neighbouring countries;

– to establish hegemony over Southern Africa; and

– to cooperate with Western powers in a military alliance, thereby reinforcing the security of racist and colonialist domination in Southern Africa.

Following an appeal by the late Chief Albert Lutuli, President-General of the African National Congress of South Africa, Afro-Asian and Socialist States and many democratic organisations all over the world launched a campaign for an arms embargo against South Africa. The United Nations adopted a number of resolutions since 1962 calling for a strict arms embargo by all States.

The Organisation of African Unity, the Non-aligned movement and others took action to press for the full implementation of this embargo, especially by the Western powers.

As, a result of the efforts of these international bodies, supplemented by those of democratic organisations committed to solidarity with the liberation movement, a number of governments announced an end to supply of arms and military equipment to South Africa.

At the same time, some Western powers, especially France, the Federal Republic of Germany, the USA, Britain and Italy with vested interests in South Africa, utilise every opportunity and every loophole in the arms embargo to enable the racist and colonialist regime to build up its military might. As international pressure increased, they resorted increasingly to secret dealings.

The most sinister and dangerous aspect of Western military involvement with apartheid South Africa is the recent revelation that South Africa is an incipient nuclear power. The aggressive nature of the South African regime forces one to believe that it may, in fact, produce its own nuclear weapons and will use them to threaten and blackmail independent Africa and pose a threat to world peace.

Taken together with the fact that South Africa has now been drawn closer to NATO by the provision of NATO's codification system for equipment and

spares to South Africa, and the Federal Republic of Germany's participation and planning in the construction of the Advokaat military communications system which is used for surveillance of the South Atlantic and Indian Ocean areas, it is clear that a great military coalition is being planned between the NATO countries, France and South Africa.

This current military build-up in South Africa, made possible by massive increase in its military budget since 1960 - from 40 million Rand to nearly 1.000 million Rand, together with the expansion of its armed forces which now number 200.000, almost wholly Whites out of a total white population of less than 4 million - is clear testimony of South Africa's determination to utilise its full military might in order to preserve the status quo within the country, and to continue the brutal repression of the Black population and the whole progressive movement.

The South African regime is continuing its illegal and highly militarised occupation of Namibia. It has established many new military bases in the territory, in addition to the large Air Force base in the Caprivi Strip, and has set up a sub-station at Walvis Bay as part of the Advokaat communications system.

The systematic military build-up in Namibia is not only intended to resist the armed struggle of the Namibian people under the leadership of SWAPO, but also to threaten African countries beyond the borders of Namibia.

The recent invasions of Southern Angola by South African troops is a blatant violation of international law and an act of aggression against the independence and territorial integrity of Angola. It is also a clear challenge to the United Nations and the Organisation of African Unity and to all freedom-loving peoples.

Vorster's manoeuvres for 'normalisation' of relations with African States, under the false and misleading call for so-called detente, while stepping up its military build-up and aggression, are intended essentially to lull the African States into acquiescence in the racist regime's nefarious plans for expansion and to facilitate wider military links with Western powers. They pose a grave danger to the security, independence and territorial integrity of the independent

African States. They must be vigorously combatted and frustrated in order to avert danger to peace in Southern Africa.

Vorster's recent approach to independent African States have been coupled with increased repressions in the country and speeding up of the establishment of puppet Bantustan regimes.

There can be no detente with the criminal and racist regime in Pretoria. The isolation and destruction of this

regime, which has been characterised by the Organisation of African Unity as the main enemy of Africa is, indeed, an essential prerequisite for genuine detente in Southern Africa.

Solidarity with the liberation movements and with the leaders in prison - Nelson Mandela, Walter Sisulu, Herman Toivo ja Toivo and others - and not fraternisation with racists and colonialists is the path to peace in Southern Africa.



Georg Leber, Minister of Defence

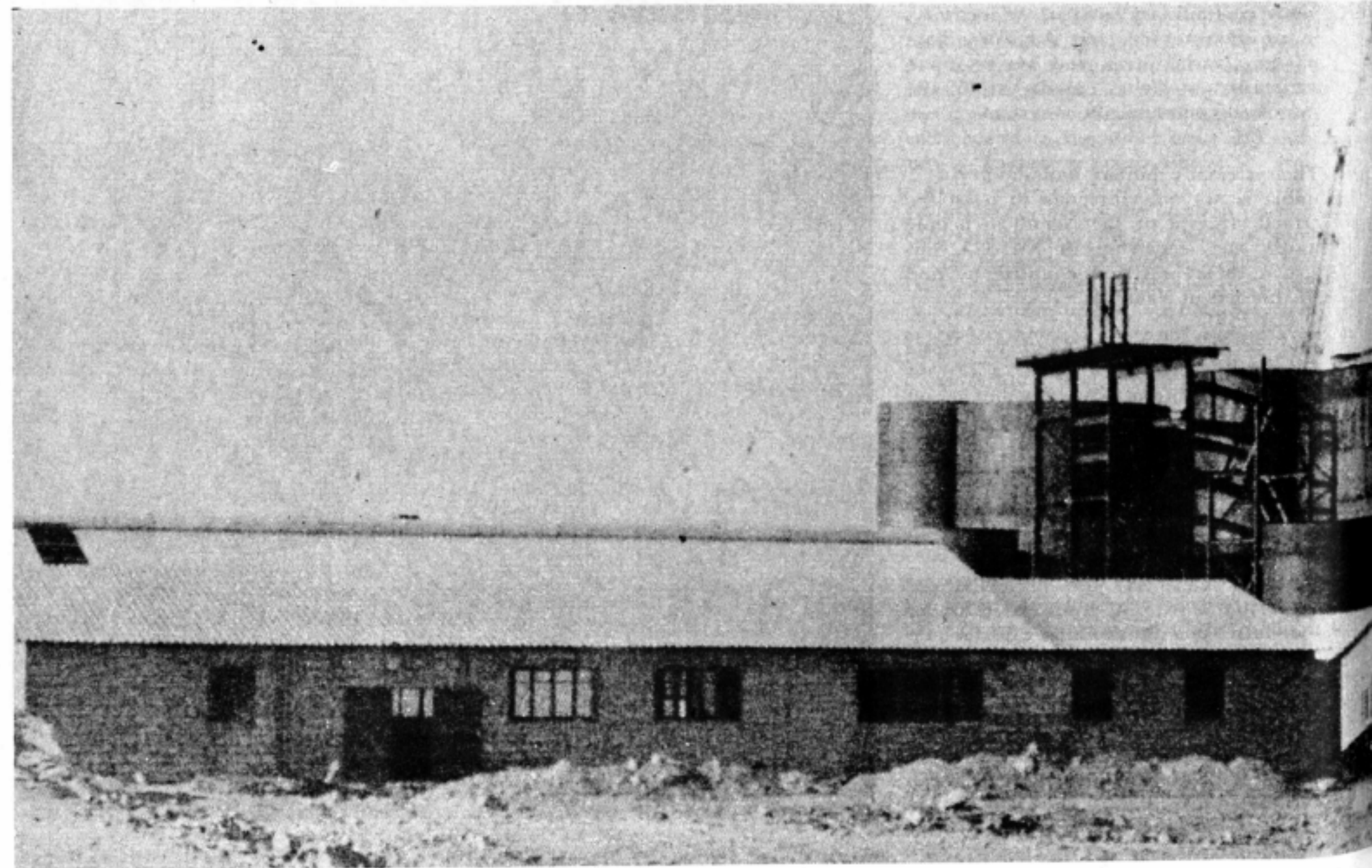


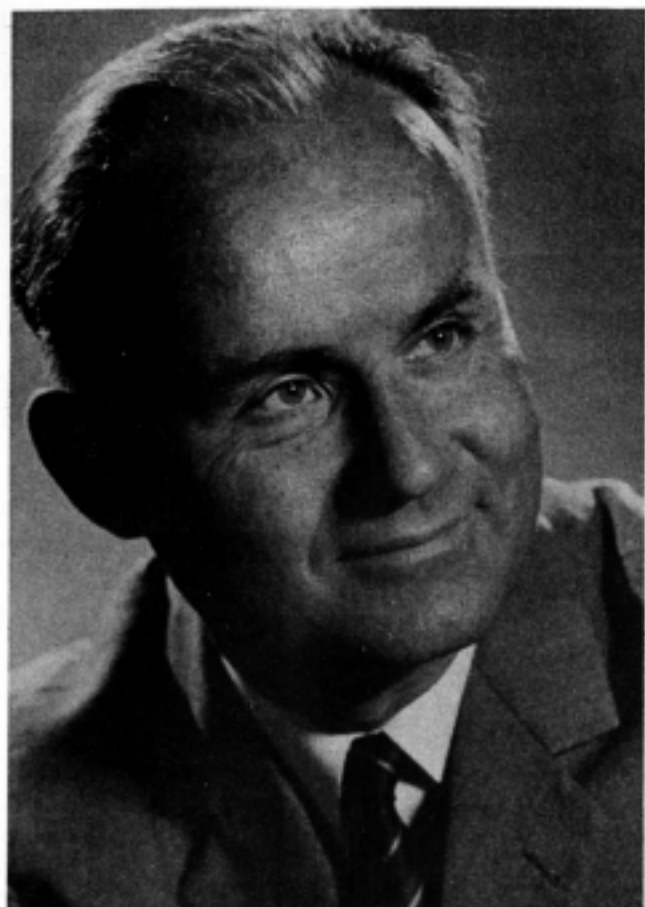
H. Schulte, Chairman of the Executive Committee of STEAG



C. B. Rohwedder, Secretary of State of the Federal Ministry of Economic Affairs with Blohm, President of the South African-German Chamber of Trade and Industry.

Uranium mine Roessing in Namibia

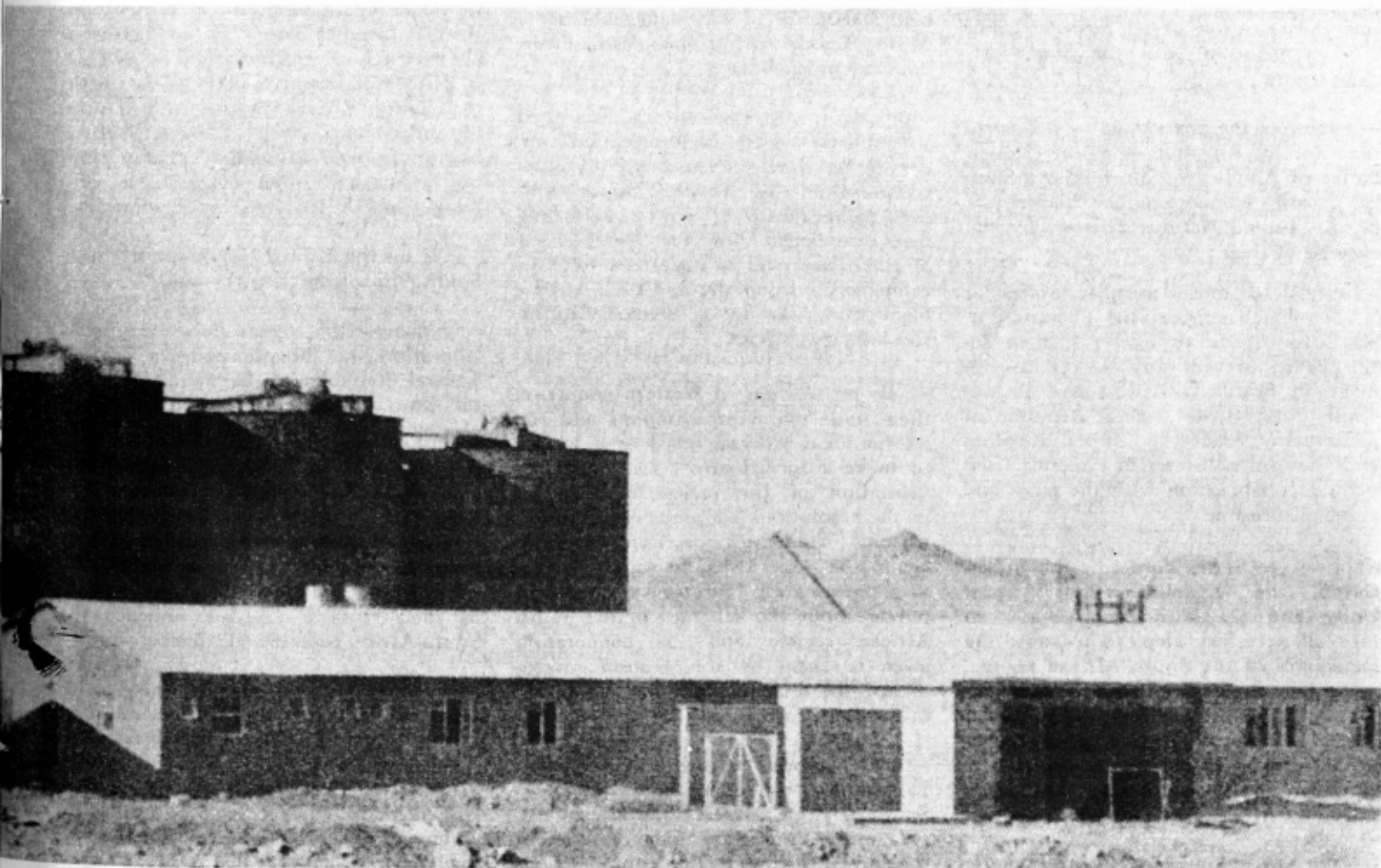




H. Matthöfer Minister of Economic Affairs



H. H. Haunschild, Secretary of State of the Federal Ministry of Research and Technology





Lieutenant General G. Rall

This Seminar therefore:

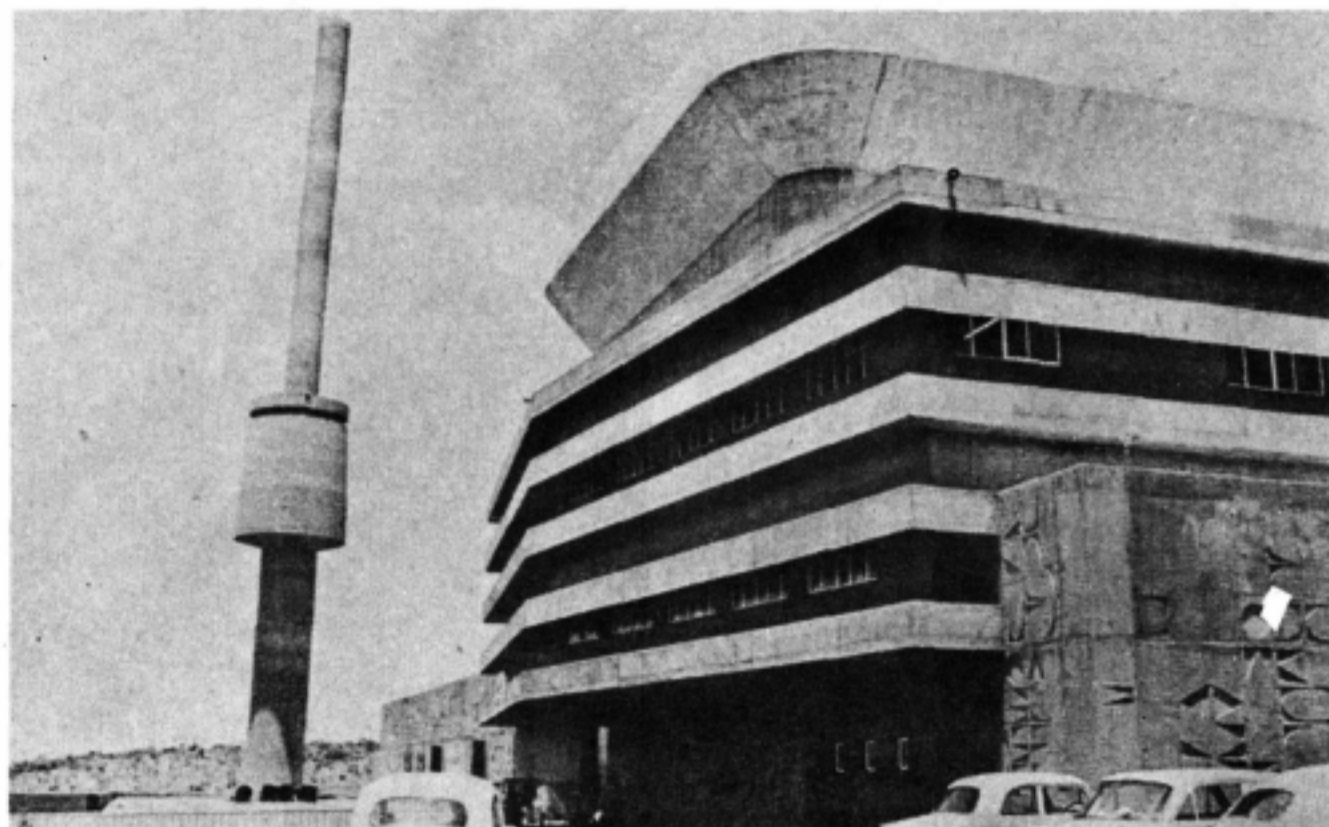
—appeals to the United Nations to take effective measures to ensure the full implementation of arms embargo, and the cessation of all forms of military cooperation with the South African regime.

—denounces the governments of France, the United Kingdom and the United States of America for preventing a mandatory arms embargo, under Chapter VII of the United Nations Charter, by the exercise of their veto.

—appeals to those member States of NATO which support the liberation of Southern Africa to exert all their influence to prevent any NATO involvement in Southern Africa, and to dissuade notably the Federal Republic of Germany, France, the United Kingdom and the United States of America from further collaboration with the racist and colonialist regime,

—appeals to States bordering the Indian Ocean, the Organisation of African Unity and the Non-aligned States to take all necessary steps to frustrate the manoeuvres of the South African regime, in cooperation with the Western powers, to step up military activity in the Indian Ocean and the adjacent areas, and condemns the agreement of the British Government for the development of a U. S. base in Diego Garcia.

—condemns the manoeuvres of the Vorster



Nuclear Research Centre Pelindaba

regime for so-called detente with the independent African States and declares that there can be no detente with a racist regime committed to apartheid and denial of the inalienable rights of the South African peoples to freedom and independence,

—appeals to all organisations concerned to publicise widely all information concerning South Africa's militarisation, and collaboration by Western States with that regime, with a view to launching mass campaigns for the isolation of South Africa; and to observe a week of campaigns - from March 14-21, 1976 - highlighting the racist regime's aggressive military policies.

—calls on workers of Western countries, their trade union organisations and the international working class as a whole, to make a special effort for the implementation of the measures embodied in the resolutions adopted by the International Trade Unions Conference in Geneva in June 1973, to supply increasing information to the international public about the schemes of the South African regime and the cooperation given to them by the Western governments, the multinational companies and the arms manufacturers.

—further appeals to the United Nations to strongly condemn the invasions of South African Armed Forces into Angola as an act of aggression, and to adopt measures to prevent the South African

regime from further acts of aggression.

—requests the United Nations and the OAU in cooperation with the liberation movements and solidarity movements in NATO member countries to publicise all evidence of collaboration by NATO or NATO organs or NATO officials with the South African regime in violation of undertakings given to United Nations bodies; as well as similar collaboration by France and other countries in violation of United Nations resolutions.

—calls on the United Nations to exclude South Africa from membership,

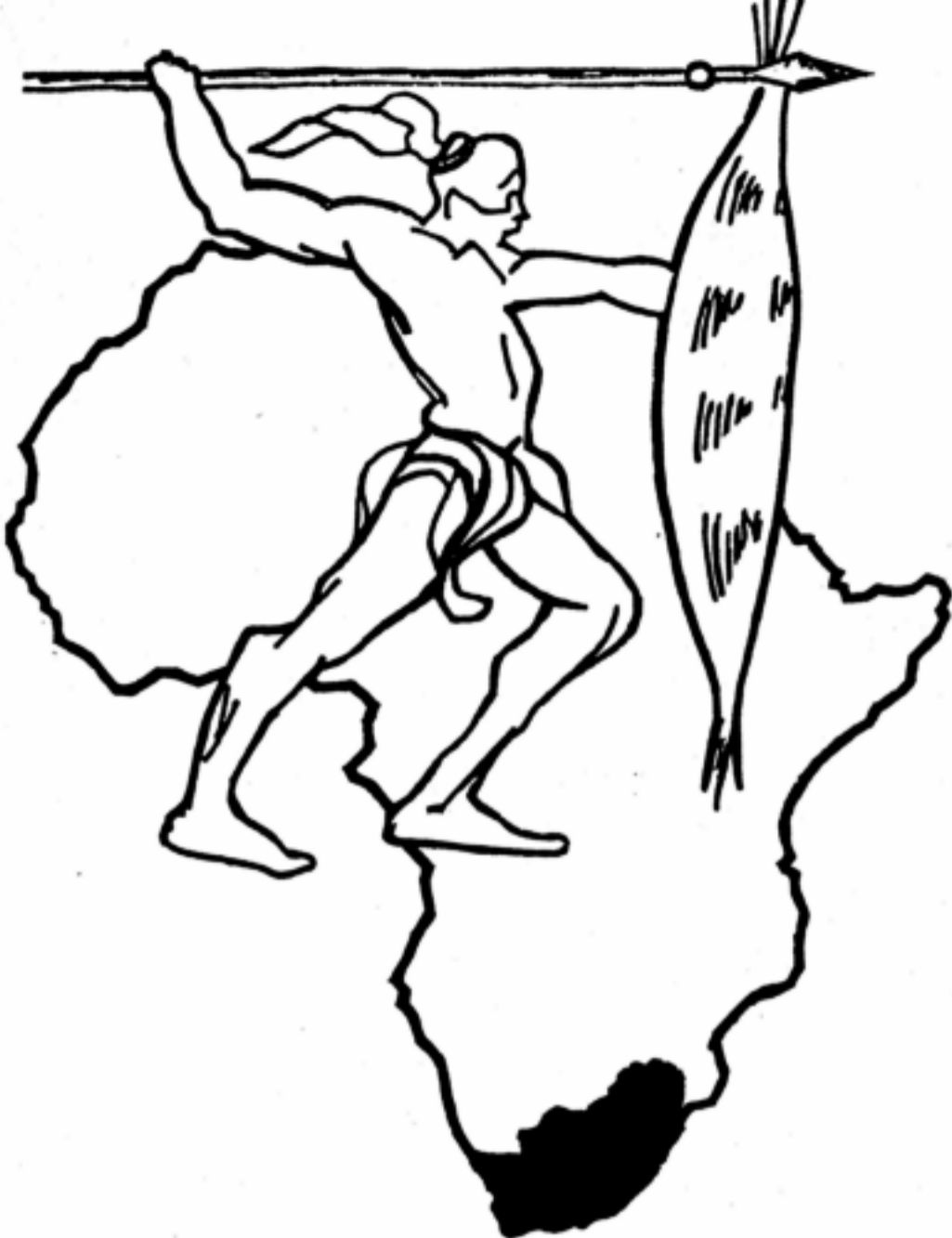
—condemns the open and secret collaboration by the governments of the Federal Republic of Germany, France, the United Kingdom, the United States of America and other countries in the military plans of the South African regime,

—appeals to all governments and organisations to provide all necessary assistance to the liberation movements in their struggle for independence of South Africa, Namibia and Zimbabwe,

—welcomes the decision of the World Peace Council to organise an international conference on South Africa in Europe during the second half of next year and believes that such a conference will help to further isolate the racist regime; and assist the liberation movements.

THE NUCLEAR CONSPIRACY

INTRODUCTION



While the regime in Pretoria tries to project a public image of peace and detente, it is simultaneously engaged in reinforcing further its military and aggressive power, and the threat it poses to international peace and security has grown in intensity and magnitude. The international community has watched with disquiet the growth of South Africa's armory of conventional weapons and the development of a locally based armaments industry aided by licensing and technical co-operation agreements with the United States, the Federal Republic of Germany, France, the United Kingdom, and Italy. Hitherto, very little attention has been devoted to the growth of nuclear potential, and South Africa has been relegated to the second rank among powers with the capacity to develop nuclear weapons.

However, by 1968, the regime was itself proclaiming its ability to manufacture nuclear weapons. Since then, the determination to construct a uranium enrichment plant, the agreements for its construction recently concluded in the Federal Republic of Germany, and the advanced stage of the development of the project programme, finally establish the nuclear capacity beyond doubt: for the regime has now acquired access to and control of both the scientific expertise required and the material resources. The determination to proceed with a project which cannot be economically justified either in terms of the enormous capital required, nor in terms of its operating costs, can only be explained in terms of its military significance; a significance emphasized by the clandestine manner in which the project has been developed, the regime's failure to subscribe to the Non Proliferation Treaty and repeated objections to placing its mines or ore processing plants under international inspection.

The African National Congress believes that the regime, which has not hesitated to use the most ruthless terror against its own people, will not flinch, when driven to desperation, from unleashing a holocaust upon the continent of Africa and the world. The South African regime has long sought to buttress itself and to maintain the privileged status of its white supporters, by acting as the tool of the imperialist powers. South Africa is now being established as a convenient loophole in any international agreements to limit conventional or nuclear weapons: for by licensing, technical and financial agreements and collaboration with the imperialist powers, that which it is attempted to control among the major powers, is being carried out indirectly in South Africa. It is incumbent upon the nations of the world in the interests of their own security to examine closely the development of the armaments industry in South Africa, and in particular the implications of the establishment of a uranium enrichment plant which will produce uncontrolled concentrated fission material for nuclear weapons. Despite Pretoria's boasts of having invented its own "unique" process for enrichment the evidence we publish here establishes the degree to which its nuclear development has been and still is dependent upon outside assistance. The South African nuclear programme is not yet self-generative nor is the situation beyond redemption.

Ignoring both the appeals from the oppressed people of South Africa and numerous resolutions of the United Nations, the Federal Republic of Germany has increased its collaboration with apartheid. It has established itself as the largest trade partner and supplier of credits. Military co-operation has been increasing, and the FRG has been acting as the agent for the integration of the apartheid regime into the NATO alliance. Clandestinely and in defiance of its own international obligations it is collaborating in establishing a nuclear arsenal on the continent of Africa.

In the name of the people of South Africa, the African National Congress demands that the Federal Republic of Germany cease forthwith its financial and technical assistance in the building of the uranium enrichment plant in our country.

In the interests of international peace and security, the nations and peoples of the world must call the Federal Republic of Germany to account.

Lusaka, September 1975

Summary

TEL. ADD. SALEG KOEIN
TELEPHONE *23 68 71



SOUTH AFRICAN EMBASSY

REF. 6/1/1

1 HEUMARKT
5 COLOGNE

AIRMAIL

19th December, 1968

A uranium enrichment plant is to be built in South Africa. The entire project has been developed with the assistance of the state-owned Society for Nuclear Research (Gesellschaft für Kernforschung - GFK) Karlsruhe, Federal Republic of Germany (FRG), the state controlled company STEAG in Essen (FRG) and with the agreement and active participation of the Federal Government in Bonn.

Though the Pretoria regime has claimed that it has developed a "unique" process for uranium enrichment, the process to be used is an adaptation of the jet nozzle method developed in the FRG by Prof. Becker. The adaptation has been carried out in collaboration with scientists from the FRG and in conditions of great secrecy.

Initial orders for equipment for the plant were placed with the MAN company Nürnberg, (FRG) in September 1974 and the construction of the prototype is to begin next year. The plant is estimated to cost \$ 1400m to install. An ancillary power station will have to be constructed at a cost of a further \$ 800m in order to provide the energy for the process.

Financial assistance from the FRG for the construction of the plant is still under consideration, and may come directly through STEAG participation, or indirectly through Brazil, to whom the FRG has extended excessive credits ostensibly for the supply of two nuclear power stations.

A uranium enrichment plant in South Africa cannot be justified economically and can only be explained in political and military terms. As Pretoria has refused to sign the Non Proliferation Treaty, it will be able to use the enrichment plant to produce uncontrolled material for nuclear weapons. The threat of proliferation could be used to deter embargoes and sanctions, while the threat to use nuclear weapons could be used to extend apartheid's hegemony on the continent of Africa. The use of nuclear weapons cannot be precluded, as a desperate measure to preserve the apartheid state.

Dear Don,

I wish to thank you for your letter 4/2/2/1 of 5th December, enclosing copies of your Letters of Credence and copies of the speech. The speech has now been translated in the Embassy and I enclose herewith a copy of the translation. Please let me know whether you find the translation in order.

Regarding the speech, I should be grateful if you would permit me to comment on the inclusion in the speech of a reference to nuclear energy and the production of uranium - vide the penultimate paragraph. As you know, the East Germans have for many years accused the Federal Republic and South Africa of close co-operation in this particular field and of secretly producing atomic weapons. I fear that the reference to nuclear energy - even though you specifically mention the peaceful uses of such energy - and South Africa as a major uranium producer, and the fact that you specifically express the hope, as South Africa's Governor on the IAEA, to be able to give special attention to this aspect of the relations between us, could be seized upon by our enemies as further proof of the collaboration of which we

Uranium Resources

Uranium as combustible matter for nuclear reactors has gained significance since the increasing control of the OPEC states over their oil reserves. Earlier, due to the fall-back in the construction of nuclear power stations and with the general limitation of nuclear armaments, the demand, price and prospecting for uranium had decreased. (Australia, whose ore deposits are considered the richest in uranium content had closed down production completely). At present the economically useful uranium deposits in South Africa amount to 163.000 tons. They are of low concentration and were initially a by-product in gold-mining. Namibia is known to possess about 100.000 tons of natural uranium over which South Africa seeks to maintain control. Together both countries contain 20 % of the world's economically

useable uranium deposits. During the 1960s when world demand was low, South Africa stockpiled a considerable quantity of uranium and even in 1973 South Africa's income from uranium exports amounted to only \$ 53 million (1), which, on the basis of world market prices is equivalent to 2,600 tons of uranium.

Development of South Africa's Nuclear Program

The South African Atomic Energy Board was established in 1949 and the country's first uranium plant was opened in 1952. South Africa's atomic and nuclear programmes received considerable direct assistance from the United States. Safari I, South Africa's first reactor at Pelindaba

have been accused for so long. This we should avoid. Moreover, from the German side it may prove difficult to prepare a proper reply in this connexion for inclusion in the Federal President's answer at the presentation of credentials ceremony, especially as both your speech and the President's reply will be published in the official bulletin which enjoys wide circulation. I feel that the less said in public

Mr. D.B. Sole,
Department of Foreign Affairs,
Pretoria.

at this stage about this aspect of our relations with the Federal Republic, the more success we shall be able to achieve behind the scenes. It is therefore strongly recommended for your consideration that the particular paragraph in the speech be omitted.

I should be grateful to receive your views on the above comments, before handing a copy of the speech and translation to Dr. von Rhamm in Protocol.

*Yours sincerely,
Herrie*

in the Transvaal was built under the United States "Atoms for Peace"-programme and installed at a cost of S 11 million. The United States Atomic Energy Commission's laboratory at Oak Ridge trained most of the South African engineers and nuclear scientists. Local research and development had been spurred by the establishment in 1957 of a Nuclear Physics Research Unit at the University of Witwatersrand in Johannesburg.

By 1965, Safari 1 had gone 'critical' and two years later Pelindaba Zero (Safari 2), South Africa's second reactor was opened. In that same year, legislation was enacted prohibiting the publication of information relating to the prospecting, production, and pricing of uranium (2).

By then the Federal Republic of Germany had become involved in South Africa's nuclear programme. The South African Digest published by the Department of Information confirmed the close cooperation and that „South African nuclear scientists and technologists have been and are being trained at research establishments in West Ger-

many, while others frequently pay visits to such institutions when they come overseas" (3). However, by the end of the following year, 1968, South Africa was anxious to conceal both the extent and nature of the FRG collaboration, for as the regime's Ambassador in Bonn warned his successor: „ the less said in public at this stage about this aspect of our relations with the Federal Republic, the more success we shall be able to achieve behind the scenes,"(p 4/5). The "success" sought is now revealed: close collaboration with the FRG in research and development of uranium enrichment, and FRG assistance in the establishment in South Africa of a uranium enrichment plant - a development which significantly increases the apartheid regime's nuclear weapons capacity, by giving it access to concentrated fission material which is subject to no international control.

Natural uranium obtained after processing in the extraction plants consists of 99,3 % of the heavy isotope U 238 and only 0.7 % of the lighter U 235 which is useable for bombs and power-producing nuclear reactors. For

the operation of nuclear reactors (i.e. the economic use of uranium) the concentration of U 235 must be increased to 3 %, for weapons it must reach 90%. Before enrichment, uranium dioxide must be chemically transformed into gaseous uranium hexafluoride. The enrichment of the isotope U 235 is technically difficult and expensive process. The degree of enrichment required however, - whether for use in nuclear reactors or for weapons, does not necessarily require new techniques, since the enrichment process can be repeated until desired concentration is reached. - The combustion of the 3%-enriched U 235 used in nuclear reactor produces plutonium which is also suitable for the production of atomic bombs

Uranium Enrichment Project

On September 11th 1974 the state-owned Energy Supply Commission (ESCOM) placed an order worth S 184m with the West German firm MAN in Nürnberg for compressors to be used in the construction of a uranium enrichment plant in South Africa. The plant will be operated on the basis of the jet-nozzle system developed in the Federal Republic of Germany. Within the next two months, the STEAG company in Essen, a fuel energy concern controlled by the Federal Government is expected to take a decision on whether it will participate in the South African project financially, in addition to its involvement - in providing the technical expertise for the construction and operation.

The plant, the construction of which is to commence in 1976, will be able to enrich uranium for both civil (11) and military (12) purposes. South Africa is not a signatory of the International Nuclear Non-Proliferation Treaty, while the Federal Republic of Germany has signed the Treaty. According to South African statements the plant is to produce enriched uranium for export and for the operation of domestic power-stations, and will also enable South Africa to produce her own nuclear weapons (12). STEAG has sought to justify its participation in the enrichment plant in South Africa on the grounds that thereby the increasing needs of German power-stations could be met (13) independently of the current suppliers: the USA and USSR. However the Non-Proliferation Treaty prohibits the acquisition of enriched uranium from any non-signatory state such as South-

Africa (14). Thus the FRG is clearly intending to violate its treaty obligations. Despite claims by South African politicians and scientists at the primary stage of the project that their uranium enrichment method was "unique in its concept" and "unequaled in the history of our country" (15), the evidence indicates that far from being unique the method to be used by South Africa is an adaptation of the West German jet-nozzle system. In addition to this system there are two other known methods of uranium enrichment to be used commercially: gaseous diffusion and the gas centrifuge process.

Gaseous diffusion is at present the only method used for large scale production. It is used by the USSR, USA, Great Britain, France, and China. Only the USSR and USA produce sufficient enriched uranium over and above their own military "requirements" to supply nuclear power stations at home and abroad.

The gas centrifuge process is believed to be the most economical, and Britain, Holland and the FRG have combined to develop the process further. A plant has not yet been established.

The jet nozzle system: The system was invented by Prof. Becker of the Society for Nuclear Research (GFK), Karlsruhe. Professor Becker worked in South Africa in 1970. Dr. W.L. Grant, the South African specialist on enrichment has published work on this system and is known to have visited Germany at twice (1969 & 1975). South African scientists including Dr. H.J. du T. van der Linde, Dr. W. E. Stumpf, R.J. Schmitt and Wilmot of the Atomic Energy Board received specialist training at Karlsruhe in 1969/70. Training of scientists continued thereafter and at least seven South African scientists visited the Nuclear Research Centre (Kernforschungszentrum-KFZ) a GFK subsidiary in 1973/4.

From the outset, officials in the FRG have been involved in the project to establish an uranium enrichment plant in South Africa. The President of the AEB, Dr. Roux, visited the Federal Republic on at least five occasions between 1972/75.

The South African Minister of Mines, Koornhof, discussed the matter with members of the government in Bonn and with the chairman of STEAG, Dr. Bund in 1975. Prime Minister Stoltenberg (CDU) of Schleswig-Holstein who is former Federal Minister of Science, discussed the project in South Africa at the nuclear centre Pelindaba in 1973 and 1974, as did Mr. Haunschild, Secretary of State of the Federal Ministry of Research and

TELEX 44-0253 Pr
O/PJW
13 FEB 1975
The Head: Institute for Nuclear Technology,
Technische Hochschule Karlsruhe,
Reaktorstation, Leopoldshafen,
KARLSRUHE
Federal Republic of Germany

Dear Sir,

STUDY : MR. P.J. WILMOT

In the latter half of this year, Mr. P.J. Wilmot, a senior scientist of the Board's Instrumentation Division, will be seconded for a minimum period of approximately 2 years to the Gesellschaft für Kernforschung in Karlsruhe, in order to gain further experience in the field of electronics, while at the same time studying for a doctorate in Electrical Engineering at the Technische Hochschule.

Mr. Wilmot obtained his B.Sc. in Electrical Engineering [cum laude] at the University of Pretoria in 1967 with Electronics, Control Theory, Computer Theory, Machines and Telecommunication as major subjects. Since 1967 he has been studying on a part-time basis for the M.Sc. degree in Electrical Engineering his main subjects being Network Synthesis, Control Systems, Computer Techniques and Advanced Engineering Mathematics. Within the next few weeks he hopes to obtain his M.Sc. degree on a thesis entitled "Analog-to-Digital Conversion using the Ramp Method".

Since he joined the Board's Instrumentation Division in 1967, his work has covered reactor experiment instrumentation including tie-in to reactor control system, interfacing between existing and newly acquired apparatus, and development work on specialised electronic modules and general electronic design.

At present he is working on the design and installation of computer-based data acquisition and a reduction system for nuclear physics experiments. His main interests lie in the fields of logic design and computer application to instrumentation and control, and he wishes to pursue his studies towards a doctor's degree on a subject related to the above.

Technology (1972), and Mr. Rohwedder, Secretary of State in the Federal Ministry of Economic Affairs (1975). The inventor of the jet-nozzle-system, Professor Becker of Karlsruhe (1970, 1974), as well as the STEAG businessmen Dr. Bund, Dr. Schulte, Mr. Geppert and Dr. Völcker have repeatedly visited Pelindaba in furtherance of the project.

Vorster has said, that South Africa possessed one of the three uranium enrichment methods existing in the world (16). While both Roux and Koornhof have explained that it was neither the gaseous diffusion nor the gas centrifuge system. (17,18, 19)

Confirmation that the "unique" South African system is an adaptation of the jet-nozzle system was provided by Dr. Roux's admission in 1975 that the South African process was developed from

the vortex tube (20), which is the basis of the jet-nozzle-system.

In reply to Parliamentary questions and in letters to the FRG Anti-Apartheid Movement, the Federal Government has denied that either the Nuclear Research Centre in Karlsruhe or the Federal Government in participating in the deal between STEAG and the Uranium Enrichment Corporation of South Africa - UCOR (21, 22, 23). However, the facts give the lie to the FRG denials:

- The export of any material and any technology relating to enrichment of uranium must have government approval in terms of the Foreign Trade Act of the FRG, § 5, II No. O118.
- The Federal Government has effective control of STEAG, 51 % of whose shares are owned by Ruhrkohle AG. The Federal Government has a 40 %

Dr. Greifeld has agreed to Mr. Wilnot's joining the staff of the Karlsruhe Research Centre in the second half of this year and has suggested that - in view of Mr. Wilnot's experience and scientific interests - a secondment to the Institut für Reaktorbauelemente would be particularly appropriate. In this connection Dr. Greifeld has in fact written to us as follows:

"Eine der gegenwärtig zur Bearbeitung anstehenden Aufgaben dieses Institutes beinhaltet die Simulation eines Reaktor-Kreislaufes. Zu diesem Zweck wurde eine Anlage geschaffen, bei der die nuklearen Brennelemente durch elektrisch beheizte Brennstäbe ersetzt sind. Die übrigen Kreislaufkomponenten entsprechen denjenigen eines Kernreaktors. Um das dynamische Verhalten des Simulationskreislaufes denjenigen einer Reaktoranlage anzupassen, ist vorgesehen, einen Analogrechner einzusetzen. Die Kopplung von Rechenanlage und Simulationskreislauf dürfte ein Problem sein, für dessen Lösung Kenntnisse auf dem Gebiet Elektronik, Reaktorregelung, Reaktorinstrumentierung und den Einsatzes von Rechnern, wie sie Herr Wilnot nach seinem bisherigen Werdegang besitzt, von grossem Vorteil sind. Diese Problemstellung dürfte daher als Thema einer Promotion geeignet sein".

In view of the above, we would be most grateful if you could advise us of the proper procedure to have Mr. Wilnot registered at the Technische Hochschule so that he may commence his studies in the next academic year, and if you could let us know which of the University's professors would be prepared to act as promotor for Mr. Wilnot's thesis.

If at all possible, we would be glad if you could also let us know if his studies would necessitate regular attendance of lectures at the University, or if the work for his doctorate would be mainly covered by practical research work at the Karlsruhe Nuclear Research Centre.

Yours faithfully,

J. P. B. HUGO

J.P.B. Hugo

DEPUTY DIRECTOR GENERAL

GKO/IB/11/2/1970

shareholding in Ruhrkohle and further exercises control over its operations through the substantial subsidies it provides to the company.

- c. The Federal Government owns 90 % of the share capital of the Society for Nuclear Research (GFK) in Karlsruhe and the Secretary of State of the Federal Ministry of Research and Technology, Hans-Hilger Haunschild, is chairman of the GFK supervisory Board.
- d. An inter-ministerial meeting attended by the secretaries of state of the Federal Ministries of Education and Science, Economic Affairs, Foreign Affairs and the Office of the Chancellor gave its unanimous support to the co-operation between STEAG and UCOR and the use of GFK technology. This meeting was held on September 27, 1973 (p.16/17).

- e. Letters on the political aspects were exchanged between Vorster and Chancellor Brandt (16/17).

However, the GFK has refused to divulge the names and dates when scientists from Karlsruhe were working at - or visiting Pelindaba, and Pelindaba scientists visited Karlsruhe. Also, specific enquiries regarding the visits of Dr. Roux, Dr. Grant and Prof. Becker were not answered by the GFK (24). In 1970 the then Minister of Mines, Mr. de Wet, pointed out that almost as remarkable as the technology of the new enrichment method was "the fact that the board succeeded to keep the project secret" (25). According to Dr. Roux, Dr. Grant had begun work on the enrichment project without the official knowledge of the Atomic Energy Board of South Africa (26).

The secrecy surrounding the enrichment

project was strengthened in 1971 by amendments to the Atomic Energy Act. In the Federal Republic, even as late as 1973, not all members of the Federal Cabinet had been informed about the commitment to South Africa. When, for example, the Federal Cabinet decided in August 1973 on the initiative of the then Minister of Economic Co-operation, Dr. Eppler, not to grant any government export credits for the project and to let it die in that way, the above mentioned meeting of secretaries of state supporting the project took place without the knowledge of members of government. Secretary of State Haunschild of the Federal Ministry of Research and Technology supported the enrichment project. Dr. Prentzsch and Dr. Rembser of the same ministry are similarly in favour of cooperation with South Africa. In Karlsruhe, at the research centre, Prof. Becker and the manager, Dr. Greifeld, are in favour of collaboration in the development of the plant in South Africa. At STEAG in Essen, those who are fully informed on the project include: Drs. Bund, Voelcker, Schulte and Messrs. Schiller and Geppert.

The Nuclear Conspiracy

In 1956 the Society for Nuclear Research (GFK), Karlsruhe, FRG, was founded (27). In 1957 the Atomic Energy Board (AEB) of South Africa was established as a separate body (28). During the same year the president of AEB, Dr. Roux, went on a six-month scientific information tour abroad (26); 1959 saw the beginning of the development of the jet-nozzle system for enriching uranium in Karlsruhe (29). According to Dr. Roux, it was in the same year that he decided that uranium enrichment within South Africa was a necessity (26). A year later, Dr. Grant, deputy director of AEB, at the request of Dr. Roux but without the knowledge of AEB, began the development of an enrichment method in strictest secrecy (26). In 1968 Dr. Roux considered it technically possible to erect a trial plant (26). At the end of that year, a three-men expert group under the chairmanship of the president of the state-owned industrial holding company IDC discussed the possibilities and feasibility of the enrichment plant and

recommended that funds be made available for a trial plant (26).

In 1969, Donald B. Sole, formerly a representative of the regime on the AEB, and a former president of the International Atomic Energy Organization in Vienna, became Pretoria's new ambassador to the FRG. The scientists Linde, Stumpf, Schmitt and Wilmot of the AEB subsequently underwent special training at the Nuclear Research Centre (KFZ - a subsidiary of the GFK) in Karlsruhe with respect to the jet-nozzle system. Dr. Grant paid a two-day visit to the Karlsruhe centre in November 1969. But at the nuclear research centre in Pelindaba, decisions had not yet been taken. For at the end of January 1970, the then Federal Minister of Science in Bonn, Professor Leussink, discussed with Sole the possibility of South Africa's participation in the joint German-British-Dutch gas centrifuge enrichment project. In March 1970, the Society for Nuclear Research (GFK) in Karlsruhe concluded an agreement with the STEAG company in Essen on the further joint development of the jet-nozzle system and assigned the exclusive world rights for industrial utilization of the process to STEAG (30, 13). Four months later, Vorster told his parliament that South Africa possessed a unique and new method for enriching uranium which was cheaper than any other method, and wished to let other countries participate in exploring the method. A trial plant was to be constructed costing \$ 112m (18). He went on to say that the enrichment plant was important for South Africa, since the sale of enriched uranium yielded larger profits than the sale of uranium ore, and a local plant would also guarantee the availability for South Africa of enriched uranium, the latter to be used in three nuclear power-generating plants designed for the desalination of 450 million litres sea-water per day. (19) At the end of 1970, the Wall Street Journal reported that Prof. Becker of the nuclear centre, Karlsruhe, was working in South Africa (31). The German politician Franz Josef Strauss (CSU) spent the month of April 1971 in South Africa.

At the end of his trip he told journalists, that a CDU/CSU government in the Federal Republic would supply weapons to South Africa (32). A few days earlier, Dr. Roux of AEB, had made a statement that with the new enrichment method South Africa was in a position to produce nuclear weapons (12).

In 1971/72 the cooperation between the FRG and SA became more concrete. At the beginning of 1972, Dr. Bund, chairman of STEAG, travelled to South Africa. On April 18th/19th, 1972 the following visitors were at the Pelindaba nuclear

Bundesministerium
für Bildung und Wissenschaft
Der Staatssekretär

SI BONN 9, den 12. Juli 1972

Heussallee 2-10 (Hochhaus)
Fernruf: 1081

Herrn

Dr. A. J. A. Roux
Präsident des
Atomic Energy Board
Private Bag 256

Vertraulich

Pretoria
Südafrika

Sehr geehrter Herr Roux!

In unserem Gespräch in Skukuza hatte ich Ihnen zugesagt, nach meiner Rückkehr in die Bundesrepublik Deutschland prüfen zu lassen, wie sichergestellt werden kann, daß Mitarbeiter einer Industriefirma, die in der Explorationsphase - also vor dem Beschluß über eine Zusammenarbeit - Kenntnis von Einzelheiten des Anreicherungsverfahrens erhalten, diese Informationen geheim halten.

Das Ergebnis der Prüfung liegt mir jetzt vor. Danach ist die Rechtslage wie folgt, soweit es den strafrechtlichen Geheimschutz betrifft:

1. Materieller Geheimschutz

Der Schutz der fraglichen Kenntnisse als deutsches Staatsgeheimnis im Sinne der §§ 94, 95, 97 StGB setzt voraus (kumulativ),

- Die Kenntnisse sind deutschen Regierungsstellen anvertraut.
- Es besteht eine irgendwie geartete Vereinbarung über Geheimbehandlung zwischen der Bundesregierung und der Regierung Südafrikas.

centre for discussions with Dr. Roux: Secretary of State Haunschild; Dr. Frenzel, senior officer for Technological Research and Development; Dr. Martin Nettesheimer, senior officer for Bilateral Relations in the sub-unit for International Cooperation; and Dr. Rainer Gerold, the personal assistant to Mr. Haunschild - all of the Federal Ministry of Education and Science, Bonn. Following this visit Mr. Haunschild sent a confidential memorandum to Dr. Roux concerning measures to keep the project and the participation of German firms in the enrichment effort secret. On January 11th - 13th, 1973 Dr. Bund of STEAG was again in Pelindaba to discuss the project with Dr. Roux. The latter visited Secretary of State Haunschild in Bonn on March 12th, 1973 also

called on STEAG in Essen from March 13th - 15th and spent part of March 16th with an unknown host in Munich. In early May 1973, the STEAG directors Voelcker and Geppert flew to Pelindaba for talks. Afterwards the South African Minister of Mines, Koornhof, announced that funds would be made available for the construction of a unit of a jet-nozzle cascade. The entire plant, for which the unit served as a basis, would be completed in the early eighties and would cost about \$ 1320m (33). On June 13th, 1973, STEAG sent a cable to Dr. Roux to the effect that STEAG Mr. Haunschild of the ministry, and the Society for Nuclear Research in Karlsruhe agreed with the joint memorandum on co-operation (p 14/15).

- Die Kenntnisse sind materiell geheimhaltungsbedürftig, d. h., daß ihre Preisgabe einen schweren Nachteil für die äußere Sicherheit der Bundesrepublik Deutschland mit sich bringen könnte.
- Die Kenntnisse werden von einer deutschen amtlichen Stelle oder auf deren Veranlassung geheimgehalten (faktische Geheimhaltung).

2. Vorbeugende technische Geheimhaltung

Hier handelt es sich um die formelle Behandlung als geheime Kenntnisse ohne Beurteilung des Geheimniswertes. Insofern müßte zunächst von Regierungsseite die bindende Zusage gegeben werden, die geltenden Verfahren der Geheimhaltung anzuwenden oder den Experten, der die Kenntnisse zur Prüfung erhält, zu verpflichten, diese nach den vorgesehenen Verfahren zu behandeln (was voraussetzt, daß der Empfänger eine solche Verpflichtung eingeht).

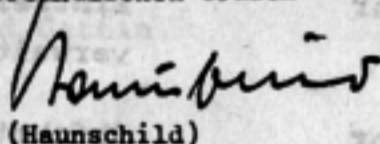
Wer unbefugt so sekretierte Unterlagen ganz oder zum Teil einem anderen mitteilt oder öffentlich bekannt macht und dadurch wichtige öffentliche Interessen gefährdet, macht sich ohne Rücksicht auf die materielle Qualität der Kenntnisse als deutsches Staatsgeheimnis nach Maßgabe des § 353 c) Strafgesetzbuch strafbar. Die Strafverfolgung setzt eine Ermächtigung der Bundesregierung voraus.

Ich hoffe, daß diese kurze Darstellung der Sach- und Rechtslage Ihre Fragen in ausreichender Weise beantwortet.

Bei unserem Gespräch waren wir uns einig, daß eine Vereinbarung oder Absprache zwischen unseren Ländern über die Geheimhaltung des Verfahrens zur Zeit nicht opportun wäre. Ich möchte aber noch einmal betonen, daß private deutsche Industriegruppen rechtlich völlig frei sind bei der Entscheidung über Beteiligungen an ausländischen Verfahren einschließlich von Absprachen über die vertrauliche Behandlung dabei erlangter Informationen, wie sie auch im umgekehrten Fall über nichtgeheime Kenntnisse frei verfügen können.

Die Firma STEAG habe ich von dieser Stellungnahme unterrichtet.

Mit freundlichen Grüßen



(Haunschild)

At the end of August 1973, the Federal Government in Bonn decided not to involve itself directly in the financing of the enrichment plant in South Africa through the granting of subsidized export credits. The many protests against government financing of the Cabora Bassa project in Mozambique and increasing awareness by the public about the West German arms supplies for Lisbon's colonial wars in Africa probably played a role in this decision. After Bonn's decision, Newby-Fraser of AEB paid a visit to the Federal Ministry of Education and Science on September 11th, 1973. On the same day, as well as on the 12th, Dr. Roux of AEB had talks with STEAG in Essen. September 13th/14th he spent with an unknown host

in Munich. On September 27th, 1973 the above-mentioned inter-ministerial meeting of secretaries of state took place, at which it was decided to maintain the established cooperation between UCOR and STEAG and the use of the technology of the Society for Nuclear Research in Karlsruhe.

Other financing sources had to be negotiated, as South Africa was not in a position to finance the necessary installations on her own. In October 1973, the apartheid information service announced that the enrichment system would be cheaper than had been assumed hitherto and would be only half as expensive as other comparable methods. When, following this announcement,

no one came forward to finance the project, STEAG was requested to undertake a fresh feasibility study on "both" systems (13). (In addition to the uranium project, South Africa envisages for the next ten years industrial investments to the tune of \$ 12400 (37) and therefore needs foreign financing.)

Dr. Roux announced in June 1974 that in addition to STEAG other overseas interests were involved in the project. This seems to be a reference to co-operation with Brazil (see p 16). In December 1974, negotiations took place with Iran for the financing of the plant in South Africa and the possible purchase of enriched uranium.

On September 11, 1974, ESCOM, S.A. placed an order worth \$ 184m with MAN, Nürnberg, for compressors designed for the acceleration of the gaseous uranium mixture. In February 1975 Dr. Grant of AEB visited STEAG in Essen, and Dr. Roux the Secretary of State Rohwedder of the Federal Ministry of Economic Affairs. Dr. Roux returned to Germany in March to call on STEAG. On April 5th, 1975, the prototype for the enrichment process at Pelindaba began operating (36). In mid-April, Secretary of State Rohwedder visited Pelindaba and had talks there with the vice-president of AEB, Dr. de Villiers, the vice-chairman of UCOR, Dr. Loubser, and the Minister of Mines, Dr. Koornhof. Dr. Koornhof in turn paid a visit to the FRG during April and met Mr. Haunschild of the Federal Ministry of Research and Technology as well as Dr. Bund of STEAG and the Federal Minister of Economic Affairs, Dr. Friderichs. Koornhof and Dr. Bund decided to organize a ten-day tour of 20 journalists from the FRG to South Africa for September 1975 in order to help sell apartheid and the project to the German public.

At the European Conference on the peaceful use of nuclear energy in Paris in April 1975, Messrs. Roux and Grant of the Atomic Energy Board of South Africa lifted the veil of secrecy. The information they proffered on "their" enrichment method proved that it was based on the German jet-nozzle system (4,6). A press release issued by them on April 23rd attempted to weaken this impression.

On May 2nd, 1975, the Scientific Counsellor at the Apartheid Embassy in Bonn, Dr. Hellwig, discussed technical aspects with Mr. Rammenzweig, the specialist for jet-nozzle coating methods of the Institute for Aerodynamics in Göttingen, FRG. On May 15th, 1975, the newspaper „Handelsblatt" (trade news) carried an item that the study undertaken by STEAG on uranium enrichment had been concluded with positive results

and that participation of STEAG in the enrichment plant in South Africa was now being studied. On July 31st, 1975 the CSU politician Franz-Josef Strauss had talks in South Africa with the Minister of Defence, Mr. Botha. During the week of August 2nd - 9th he met the Minister of Mines, Mr. Koornhof, as an official guest on a farm belonging to the South Africa regime. On August 1st, 1975 the vice-president of UCOR, Dr. Loubser, called on the company Internationale Nickel Deutschland in Düsseldorf, FRG, and discussed the order placed with them concerning the homogeneous coating of the jet-nozzles through electro-forming. Shortly before that it became known that one of the OPEC countries provided a credit of \$ 1000 m to the Ruhrkohle AG, the mother company of STEAG. It seems likely that these funds, which could well originate from the Shah of Iran, as well as the generous credits made available for the German nuclear reactors for Brazil (see p. 16) are destined for the STEAG-UCOR project in South Africa.

South Africa's Desire for Nuclear Weapons

The Pretoria regime's statements on the purpose and ultimate aim of its nuclear programme have been contradictory. Even denials of statements on the military aspects of the nuclear programme have been equivocal and have carefully avoided any categorical renunciation of nuclear weapons.

While Pretoria has emphasised that the enrichment plant is planned for "only peaceful purposes", it has never spoken of "only civil purpose".

South Africa is not a signatory to the Non Proliferation Treaty and has opposed international inspection of her mines or processing plants.

South African claims notwithstanding, the massive investments necessary for the nuclear programme cannot be justified economically, either on the basis of exporting enriched uranium or meeting South Africa's energy requirements.

Uranium Exports

Enriched uranium is sold by the governments of USA and USSR at subsidized price of \$ 38.50 per kilogramme at the

Essen, den 27. Februar 1973
V8/G1

Besuch von Herrn Dr. Roux.

13.3.1973

Abholung von Dr. Roux zum GK West
16.30 Uhr **Ankunft der Herren Dr. Roux, Dr. Bund, Dr. Völcker, Geppert im GK West**
Führung durch das GK West
18.00 Uhr **Abendessen im Haus Wohnung, Voerde, Dr. Roux, Staatssekretär Haunschild mit Gattin, Dr. Nettesheim mit Gattin, Dr. Bund mit Gattin, Dr. Schadtberg mit Gattin, Dr. Völcker mit Gattin, Geppert**

Übernachtung für Herrn Dr. Roux im Kaiserhof, Essen

14.3.1973

9.45 Uhr **Eintreffen von Botschafter Sole, Hauptverwaltung**

10.00 Uhr **Abfahrt ab Hauptverwaltung zum Kraftwerk Lünen**
Sole, Dr. Roux, Dr. Völcker, Geppert
Besichtigung der KDV-Anlage

gegen 13.30 Uhr **Mittagessen im Hotel Kreuzkamp bei Lünen**

16.00 Uhr bis ca. 18.00 Uhr **Besprechung bei Dr. Bund**

19.00 Uhr **Aperitif bei Bunds**

20.00 Uhr **Abendessen im Ange d'or, Kettwig**
Sole, Dr. Roux, Dr. Bund, Dr. Völcker, Geppert
Übernachtung für Herrn Dr. Roux im Kaiserhof, Essen

15.3.1973

- 10.30 Uhr Abflug mit Privatmaschine
(Dr. Roux, Dr. Bund mit Gattin,
Dr. Völcker mit Gattin, Geppert)
Mülheim - München (Cessna 421)
- gegen 12.00 Uhr Landung in München
Fahrt zum Hotel Sheraton, Arabellastraße
(Hotel Continental und alle anderen bekannten
Hotels wegen BAUMA seit Monaten vorbestellt!)
- 13.00 Uhr Mittagessen im Restaurant "Die Mühle"
im Hotel Sheraton
Besprechungen über Kooperation
- 18.00 Uhr Abendessen in der "Altbayern-Stube"
im Hotel Sheraton
- 19.30 Uhr bis ca. 22.00 Uhr Besuch im Gärtner-Theater "Der Babler
von Sevilla"
Übernachtung im Hotel Sheraton

16.3.1973

- vormittags Aufenthalt in München
- 11.00 Uhr Fahrt nach Rottach-Egern
- 12.00 Uhr Mittagessen im Hotel Bachmair am See
in Rottach-Egern
- gegen 13.30 Uhr Abfahrt Dr. Bund und Gattin nach München
- 15.00 Uhr Abflug Dr. Bund und Gattin
München - Mülheim
Dr. Roux, Dr. Völcker und Gattin, Geppert
verbringen den Abend in München (Schwabing?)
Übernachtung Dr. Roux, Dr. Völcker und Gattin,
Geppert im Hotel Sheraton

17.3.1973

- 11.15 Uhr Abflug Dr. Roux
München - Frankfurt (LH 751)

moment. The cost of a gaseous diffusion plant capable of enriching 9000 tons of natural uranium per annum is approximately \$ 1500 m. As the process uses 2,330 KW for enriching one kilo of uranium, special power stations have to be constructed at an estimated cost of a further \$ 1000m.

The "European Club" of Britain, Holland and the FRG has not been able to establish an economically viable plant based on the gas centrifuge process. However, it is estimated that such a plant for enriching 9000 tons of natural uranium per annum would cost \$ 2000 million to construct. The consumption of electricity in this process is only 230 KW per kilo and hence a further \$ 100m investment in power station is required. The estimated price of the enriched uranium produced by this method is \$ 53 per kilo. A jet-nozzle plant is estimated to cost \$ 2500 million. It has a higher power requirement at 3.800 KW per kilo, necessitating additional investments in power stations of \$ 1800 million. South Africa has announced a sales price of \$ 74 per kilo.

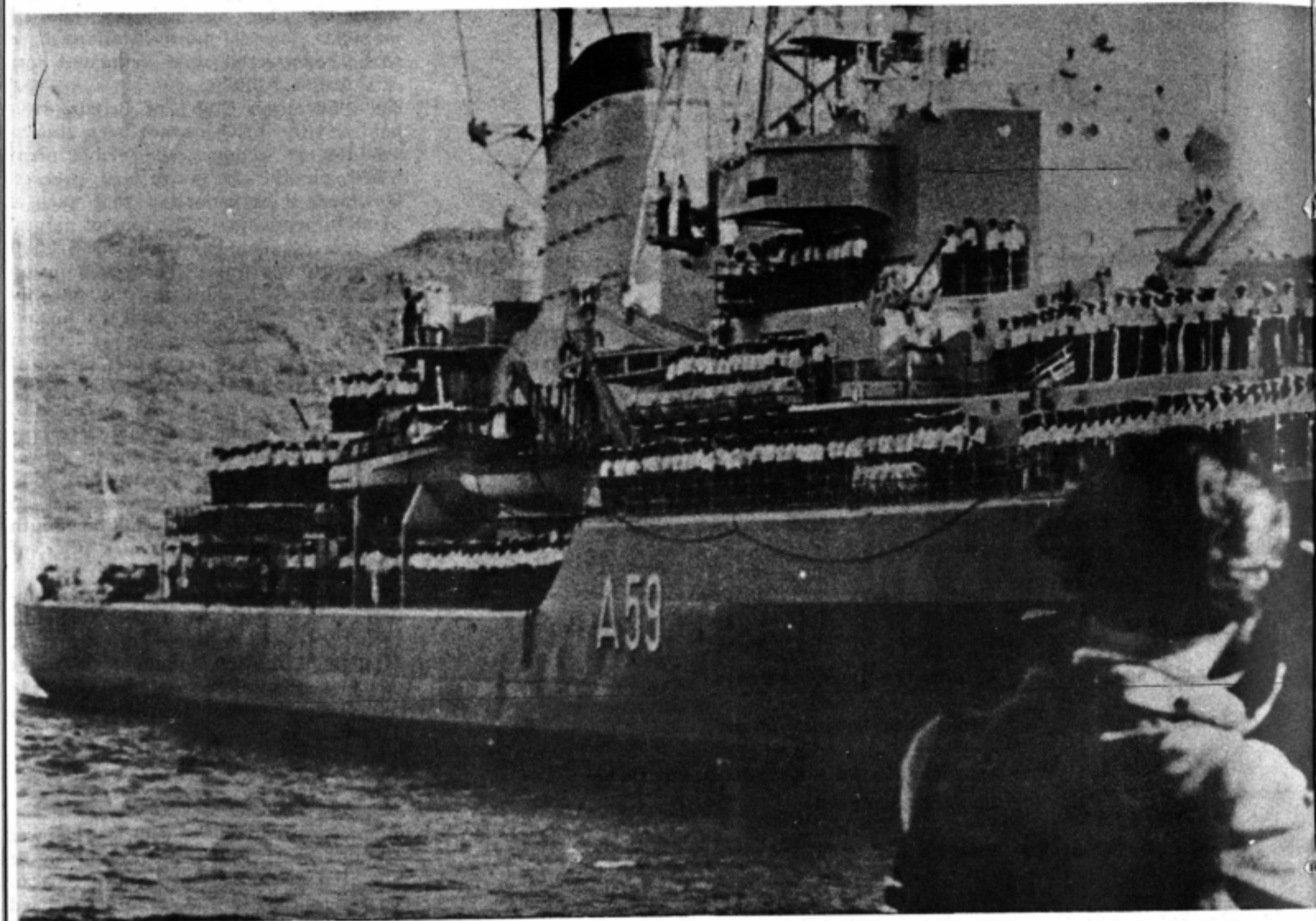
South Africa's export of enriched uranium could only be profitable if South Africa operated a virtual black market supplying enriched uranium to states which were not prepared to accept the safeguards of the Non Proliferation Treaty.

Nuclear Power Stations

The construction of nuclear power stations costs four times as much as coal-fed power stations. South African coal is cheap at \$ 3 per ton pithead price compared to \$ 9 in the US and \$ 60 in the FRG. Therefore the use of nuclear power stations in South Africa for generating electricity cannot be justified on economic grounds. South Africa has ample coal resources for 1000 years as was explained by the economic counsellor of the Embassy at Cologne in an advertisement in the West-German newspaper "Die Welt" on April 14th 1971. But even here obfuscation is practised. In the same newspaper the AEB justified the enrichment plant with fears that there was only coal for 60 years. No less a person than the chairman of the AEB said in August 1973, that South Africa has no nuclear power programme (38).

The nuclear programme can only be justified in terms of political and military considerations. With control of nuclear material the Pretoria regime could consolidate its military links with the western powers, while at the same time by operating outside international

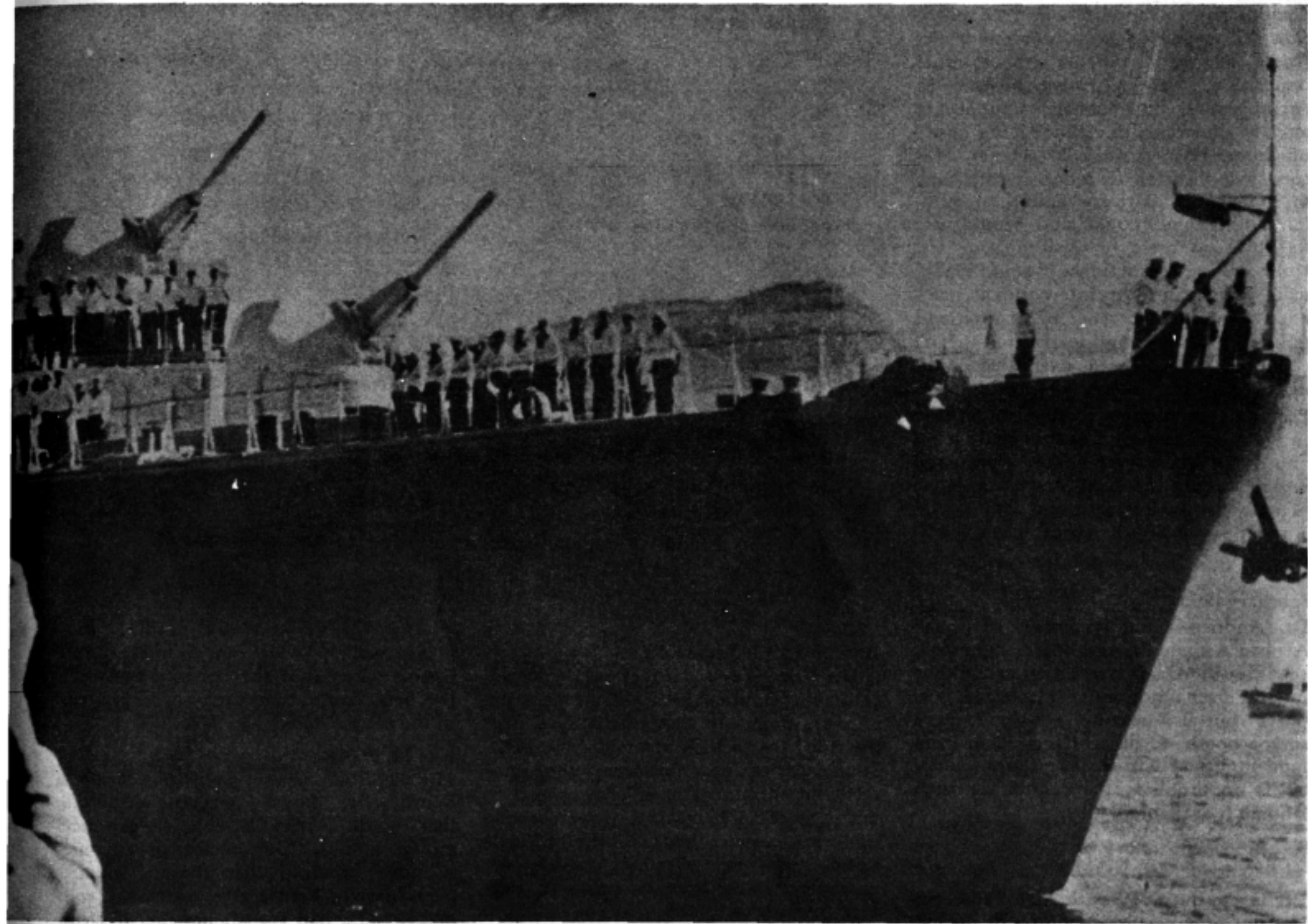
Military Cooperation



(from left to right) Milan-Rockets as german-french co-operation sold to SA at the end of 1974 German helicopter BO 105 sold to SA

between FRG and SA

German Navy visiting Simonstown at March 1974



1972 Corvette built under German licence for SA

controls, it could buy 'friends' by providing nuclear materials and technology to non-signatory states. The development of nuclear weapons would be used to demonstrate to supporters in the country that the regime could stand alone in defiance of world opinion and internal opposition. The aggressive posture in Africa would be enhanced, and having already threatened to „bloody the nose” of 'interfering' African Presidents, Pretoria will threaten to reduce recalcitrant or 'unfriendly' African capitals to rubble. The regime could and would use its nuclear muscle to weaken boycotts, embargoes and sanctions: it could blackmail Africa and the international community into acquiescence in its apartheid policies at home and expansion of its economic stranglehold over the continent. Finally, there is nothing in Pretoria's record as a member of the international community that could leave any doubt whatsoever, that a beleaguered regime would as final desperate move actually use nuclear weapons. But let white South Africa speak for itself:

February 1965:

Dr. Andries Visser - member of South African Atomic Energy Board, suggested, that South Africa needed to establish a nuclear arsenal not only for „prestige purposes” but also because „we should have such a bomb to prevent aggression from loud mouthed Afro-Asiatic states....money is no problem, the capital for such a bomb is available.” (39).

August 5, 1965

H.F. Verwoerd:

„It is the duty of South Africa to consider not only the military uses of the material but, also to do all in its power to direct its uses for peaceful purposes.” (40).

December 1968:

General H.J. Martin, Army Chief of Staff said, that the work on missile development being carried out in South Africa was related to the fact that South Africa was now ready to make its own nuclear weapons(41).

May 6, 1969: Die Volksblad (editorial) „Friendly approaches are usually made towards a country with a powerful military fist, because such a country can be a valuable ally in war time, and in time of peace again it can be a valuable market or a seller of armament and strategic material. The resulting trade helps to peace again it can be a valuable market, or a seller of armaments and strategic material. The resulting trade helps to built bridges of friendship, even on the diplomatic level.” (42).

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dr. a.j.a. roux
president atomic energy board
pretoria
republic of south africa

dear dr. roux,

with reference to article 14 of the memorandum of understanding between ucor/aeb and steag we have the pleasure to inform you as follows:

1. steag board of management has agreed to the memorandum.

July 26 1970: Die Beeld

„ Mr. Vorster has not yet said categorically that South Africa will never make an atom bomb. In view of this fact, people will have to look at us in a new light. South Africa now becomes altogether different proposition if you want to tackle it. This bargaining power can be used in various fields in the difficult years that lie ahead. America for example, would have to revise its strategy towards us.” (43)

April 12, 1971

In a radio interview Dr. Roux said, that with its own uranium enrichment method, South Africa was theoretically in a position to produce nuclear weapons. He explained that it would not have been practical, and was actually impossible for South Africa to produce nuclear from plutonium. The reasons were that much of the material and equipment needed to use plutonium militarily would have had to be imported. Such a plant would also have come under international control. Although it was the policy of South Africa to use her enriched uranium for peaceful purposes, the new method recently developed in the country made production of atomic weapons possible (12).

July 1971

Dr. Roux of AEB: „If a country wishes to make nuclear weapons, an enrichment

plant will provide the concentrated fission material if the country possesses the necessary natural uranium to process in the plant.” (44).

July 12, 1974

The vice-chairman of the Atomic Energy Board, Dr. Louw Alberts, declared, that South Africa is able to produce atomic bombs. „Our nuclear programme is more advanced than that of India.” (45) Shortly before this statement was made, India had set off her first nuclear explosion.

That Bonn and Pretoria have something to hide in the realm of their nuclear cooperation becomes evident from the letter of apartheid ambassador Uyl to his successor-designate Sole quoted above and from the confidential memorandum from Mr.Haunschild to Dr. Roux (see p 4/5 and 8/9).

Newspapers in the Federal Republic, (46, 47), the spokesman of the GFK Karlsruhe (48) as well as the responsible government official (49) have said in connection with the recent nuclear agreement between the FRG and Brazil that the jet-nozzle system was not suitable for high-degree enrichment of uranium for military purposes, since the process would take innumerable years. This information is untrue. The proposed South African plant, for example, is to reach a 3% enrichment in 16 hours (6). By means of simple repetition of the process the necessary concentration could be achieved within a few months.

2. state secretary haunschuld was informed by dr. bund about the memorandum and has agreed to proceed as planned.
 3. gfk has given approval to the memorandum in principle. gfk has recommended an equivalent wording with respect to point 2 a and 2 b in the final agreement.
 4. with respect to the political situation we refer to the recent letter exchange between prime minister vorster and chancellor brandt.
 5. we kindly ask you to proceed in this matter as agreed during our meeting.
- best regards,
steag - dr. v?oelcker

44-0233

FRG strengthens Apartheid

Thirty years ago fascist rule in Germany was destroyed, not from within but by external military forces. Since then, the FRG has been a consistent supporter of colonial powers in Africa including the Pretoria regime. The Federal Republic of Germany was the largest supplier of weapons for Portugal's colonial wars in Africa. As late as the beginning of 1974, the FRG was assisting in the construction of an ammunition and bomb factory in Lisbon (50). The FRG did not, within the framework of a „division of labour and partition of the market“, adopt „the relatively carefree attitude with which the governments of countries such as France and Great Britain handle arms exports“, as Secretary of State in the Federal Ministry of Defence, Wolf Mommsen, phrased it (Oct.2,1970). Instead it became the largest trade partner, and by far the largest supplier of credits to apartheid South Africa. 50% of all outstanding foreign loans \$ 1440m, originate from the

FRG. Furthermore, there is evidence that, contrary to all its denials, the FRG supplied military trucks before 1971 (51) and 1974 (52) as well as—in cooperation with France - Transall military planes, Milan rockets and helicopters (52). Installations for the military communications centre Silvermine near Cape Town were supplied by West German companies. The Bundeswehr (federal army) facilitated the inclusion of the centre in the unified NATO codification system (53). Two staff members of Pretoria's Embassy in Bonn participated in November 1970 in a codification training course at the Military Supplies Division (Materialamt der Bundeswehr) in St. Augustin near Bonn. Despite all evidence to the contrary, the Federal Government continues to maintain at the UN and elsewhere that there is no German-South African military co-operation.

South Africa and the Federal Republic of Germany make natural allies, so they each have their own reason for the clandestine development of nuclear weapons. In its original conception, the project and collaboration with South Africa may have been an attempt by leading German companies and nationalistic politicians to procure civil and military nuclear power independently of the USA. The Federal Republic of Germany is prohibited from producing nuclear weapons on its own territory as a result of the Brussels Agreement of 1953

adopted by the West European Union. Despite that, there are circles within the Federal Government who are very keen to lay their hands on nuclear weapons. One of the main exponents of this is the former Federal Minister of Defence and Atomic Energy, Franz Josef Strauß, who, for instance in 1959 tried, but unsuccessfully, to secure Federal German participation in the French Nuclear-weapons-project and is also the man, who in the latter part of the sixties did his utmost to prevent the signing of the Non Proliferation Treaty. He is a regular visitor to South Africa, having visited that country in 1966, 71, 73, 75. In 1973, Dr. Roux paid two unexplained visits to Munich, the town where Strauss lives. Visits to the Munich-based firms involved in the jet-nozzle plant such as Linde, Siemens, Messerschmitt-Bölkow-Blohm were not on his itinerary.

For the construction of atomic weapons, the Pretoria regime offered the FRG valuable prospects or has created them. Although the USA, Great Britain and France were supplied with uranium for military purposes by South Africa, and although „the makers of the first atomic bomb were secretly informed by Smuts as early as 1941 of the existence of uranium in South Africa“ (South African Yearbook 1974, p. 98), „none of the world powers possessing the highly sophisticated and military significant enrichment technology was willing to share it with South Africa“ (Ibid. p. 34).

In order to protect its cloak of secrecy over its atomic project, the dissemination and receiving of any information on the facts and progress in reference to uranium deposits, advancement, haulage, enrichment, etc. is punishable by law with imprisonment up to 20 years and a fine up to \$ 12000. The present SA ambassador in Bonn, Sole, has written, that the „tactics“ adopted by the SA government on the question of uranium sales for civil purposes „produced their dividends“, i.e. „of avoiding commitments as far as it is possible to do so and retaining as much freedom of action as our resources and political position allow“.

The South African uranium industry was created by the USA and is accessible to their computation. Only the size and contents of the uranium deposits of Rössing in Namibia are unknown and here the FRG involvement becomes evident.


The participants in the development of the Rössing mines besides the South African Industrial Development Corporation (25%) and General Mining (25 %) are Total - France (10 %), Rio Tinto Zinc-Britain (20 or 25 %) and the Urangesell-

schaft - West Germany with 15 or 20 % of the shares.

The FRG firms VEBA (government owned) and STEAG (government controlled) each own 33 % of the Urangesellschaft. Prospecting costs of \$ 2.4 million for the German firm in Rössing were met by the Government of the Federal Republic of Germany for period 1969-70. But since 1971 there have been no official payments by the Federal Government, a consequence of the protest wave against the state financing of the Cabora Bassa dam. However, in view of a statement made by State-Secretary Haunschild it would appear, that the Urangesellschaft received a very large subsidy from the government for uranium prospecting in Niger from 1972 onwards without having to account for the manner in which that money was spent (approximately another \$ 2.4 m).

It is unlikely that Urangesellschaft would participate in Rössing unless it was protected against financial loss by the Federal Government which also will have to purchase its share of the uranium quota (760 - 1000 tons from 5000 tons). The Federal Government, in an answer to a question in Federal Parliament stated that it did not feel bound by the decision of the UN Namibia Council of September 27, 1974, which states inter alia every export of Namibian minerals without approval of the Council is illegal (57).

FRG involvement is also evident in the construction of an extraction-plant at the same time in Rössing, in which the firm Nukleare Chemie und Metallurgie (Nukem), of Wolfgang near Hanau (FRG) is participating. Nukem receives a substantial subsidy from the government. Hitherto South Africa's uranium has been converted in the United Kingdom. The new enrichment plant, according to Roux (35) will also contain its own hexafluoride conversion plant. This would give South Africa complete secrecy in all phases of nuclear activity from mining to the possible production of material for nuclear weapons. The construction of the uranium enrichment plant facilitates the establishment of a nuclear arms potential not only in South Africa but also in other non-signatory States, e.g. Brazil. On June 26th, 1975, an agreement was signed between the governments of the FRG and Brazil for the supply of two nuclear power-stations by private companies to Brazil at a value of \$ 880 million. The agreement commits the FRG, inter alia, to supply enriched uranium to Brazil for the operation of these power-stations. The agreement also includes the pro-



STEAG Aktiengesellschaft, 4300 Essen, Postfach 7020

S E C R E T

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|--------------|--------------------|----------------|----------------|-----------|--------------|
| Ihre Zeichen | Ihre Nachricht vom | Unsere Zeichen | Sachbearbeiter | Durchwahl | Datum |
| | | V8/G1 | | 7994 2339 | Oct. 2, 1973 |

Dear Dr. Roux,

Referring to article 3 of our agreement we have requested formal approval for sublicensing our rights according to our contract with Gesellschaft für Kernforschung Karlsruhe (GfK). GfK has agreed to our request in principle but needs approval of Staatssekretär Haunschild as chairman of GfK supervisory board.

spect of establishing a jet-nozzle uranium enrichment plant in Brazil. Since construction of a trial plant is to commence only in 1981 (54), the erection of a commercial enrichment plant would not be possible before 1985 at the earliest. Moreover, Brazil possesses only 2,480 tons of known deposits of natural uranium which can be economically utilized (47); a further 12,500 tons in the country would be worth mining only if world-market prices for the commodity doubled. It follows that Brazil, at this point, can neither feed the envisaged total of eight nuclear power-stations for the country nor pay the FRG for the installations with uranium.

The part of the Brazilian nuclear power-station project to be supplied from abroad and to be financed through credits amounts to S 800m (55). The state-owned bank "Kreditanstalt für Wiederaufbau", Frankfurt, FRG, and a West German bank consortium, however, intend to make S 1000m available. (56) The technical journal "Nuclear News" of July 1975 states that an amount of S 1400m is envisaged. Further investigation into the Brazilian credits is necessary, for it may well be that the

industry in the FRG, through this oversized credit to Brazil, are going to participate in the financing of the plant in South Africa in the form of a „Brazilian" participation in the South African scheme. On June 5, 1975 „Frankfurter Allgemeine Zeitung" referring to the deal with Brazil, said: „A rejection of the agreement, however,...could have brought about negative effects on other possible co-operation schemes with other countries".

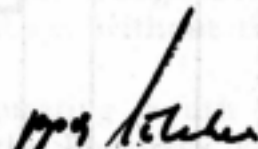
The plant erected by STEAG could produce 1 250 tons of enriched uranium per annum, while the consumption of the nuclear power-station planned at Koeberg, South Africa, is expected to be only 100 tons per annum. Brazil could acquire enriched uranium from South Africa. Since the German-Brazil agreement does not provide for the return of the plutonium gained from the combustion of uranium in power-stations. Brazil, too, would come into possession of nuclear matter for atomic weapons. Thus the FRG is assisting in providing uncontrolled nuclear material to forces in Africa and Latin America, which are determined to maintain the status quo of oppression. Though the US Congress has criticised the supply of nuclear

We have unofficially been informed that on request of Mr. Haunschild Staatssekretäre of Ministry of Economy, Ministry of Foreign Affairs and of Chancellor Brand's office have met on 27th of September to discuss this matter. They have given a positive reaction to the GfK position. However on request of the Ministry of Foreign Affairs a legal investigation to find out whether the Außenwirtschaftsgesetz is applicable in this case is still necessary. The expert of the Ministry of Economy, who has meanwhile contacted us has already unofficially confirmed that this law is not applicable and that he cannot see a reason to withhold Mr. Haunschild's approval.

We have once more underlined the urgency of this matter and expect the final decision within the next days. We are extremely sorry for this delay and shall keep you informed about any further steps.

Yours sincerely,

S T E A G
Aktiengesellschaft


(H. Völcker)


(H. Geppert)

power-stations to Brazil, no action has been taken to stop US companies from participating. General Electric USA holds 11 % of the share capital of the AEG, which is itself a 50 % shareholder in the Kraftwerksunion (KWU) the company which is the main supplier for the Brazil deal.

Though the FRG is the agency being used for providing the Pretoria Regime with nuclear capacity, *the major Nato powers are undoubtedly involved for all parts, at least of the compressors delivered by MAN receive NATO code numbers from the Defence Ministries of the supplier countries.*

What is to be done?

The information provided above, for all of which undisputable documentary evidence is available, establishes beyond doubt that the FRG has been conspiring to place nuclear weapon capacity into the hands of a regime that is con-

demned by the entire world community and is recognised as an enemy of independent Africa. In doing so, and not by accident, the FRG is also acquiring control of nuclear material contrary to its own treaty obligations - a development which should concern all those professing support for international peace and detente.

It is not yet too late to stop the construction of this monstrous project on African soil. There is already opposition to the project in the FRG. The former development aid minister, Dr. Eppler, is a declared opponent of the project, as is Dr. Uwe Holtz (SPD), Chairman of the Committee on Economic Cooperation of the Federal Parliament, Bonn. The Young Socialists voted against it at their national congress in February 1975.

The Anti-Apartheid movement has launched a campaign against the project. Now that the full extent of the nuclear conspiracy is revealed, peace loving forces throughout the world must make their voices heard - at the UN, in Geneva, in Addis Ababa and above all in Bonn, for the Federal German Government must be called upon to account for its actions and plans.

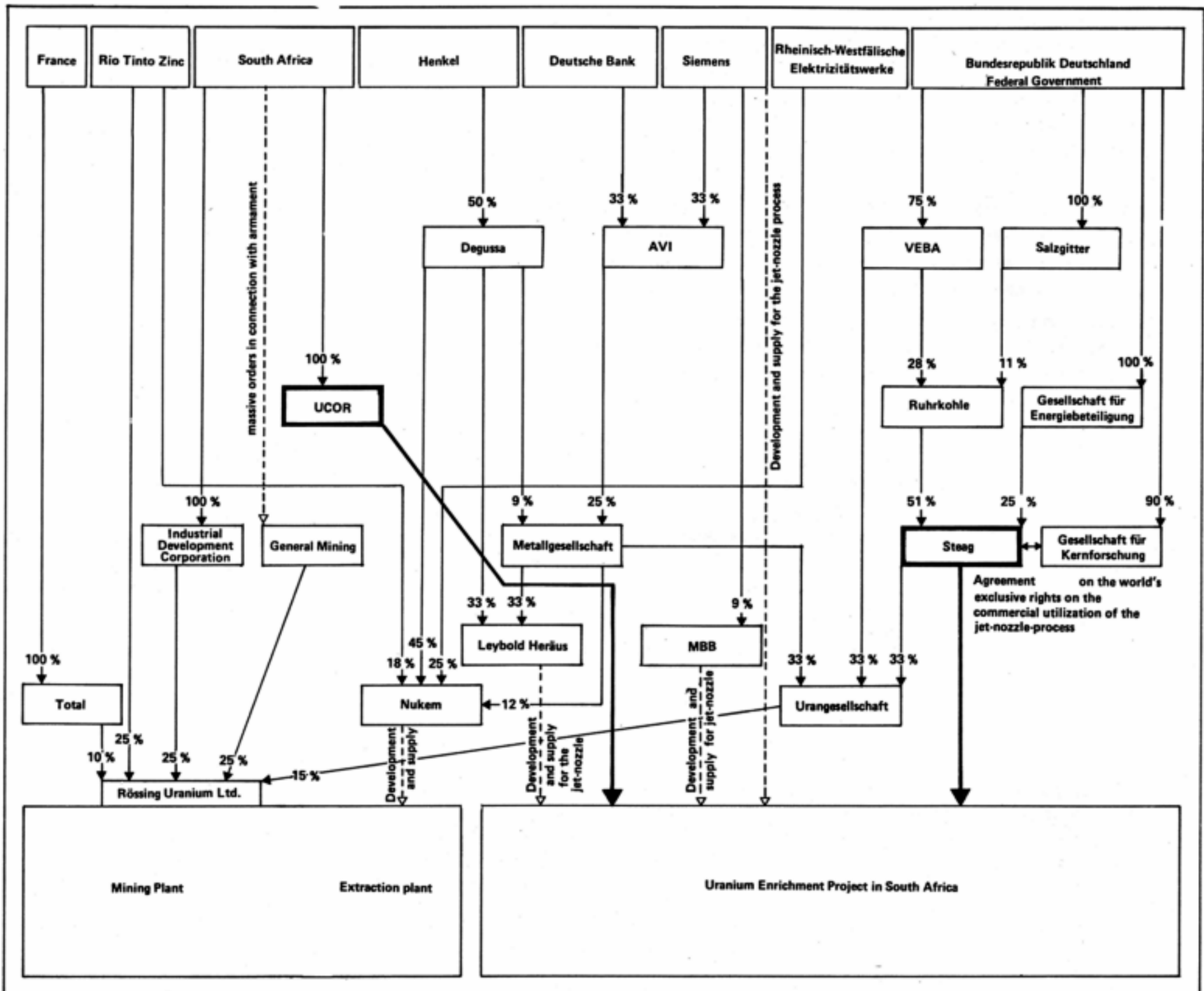
In Pretoria, the true face of Vorster once again stands revealed. Whilst extending one hand in ostensible "friendship and peace" to free Africa, with the other hand, apartheid South Africa is surreptitiously but deliberately building up sufficient military power as will devastate our continent.

All those who join hands with the Pretoria regime must bear the responsibility for the holocaust that must surely follow if this nuclear conspiracy is allowed to reach its aims.

Footnotes

1. „Handelsblatt“ (trade news), FRG, 24.10.1974
2. Act 90/1967 - Atomic Energy Act
3. South African Digest, 23 March, 1967
4. "Le Monde", France, 24.4.1975
5. "Neue Zürcher Zeitung" Switzerland 24.4.1975
6. "Der Spiegel", FRG, 18/1975, 24.8.1975
7. "Le Monde", France, 31.7.1975
8. Jahrbuch der Atomwirtschaft (Yearbook of Nuclear Affairs), Düsseldorf, FRG, 1974, p 173
9. "The Times", U.K., 20.8.1973
10. Nuclear Engineering International, July 1974
11. The Star, 12.4.1975
12. The Star, 17.4.1971
13. Press release STEAG company, Essen, FRG, 9.4.1974
14. Gerhard Flämig, MP, in "SPD Press Service", P/XXIX/98, 24.5.74, Bonn
15. B.J.Vorster - House of Assembly Debates, Vol. 25, col. 5,7,8.
16. "Rand Daily Mail", RSA, 14.8.71
17. "The Star", 27.3.71
18. "Süddeutsche Zeitung", Munich, FRG
19. "afrika heute" (Africa today), Bonn, FRG, 15.9.1970
20. Press release Uranium Enrichment Corporation Ltd. S.A. at Paris 23.4.1975
21. Letter Federal Ministry of Research and Technology, Bonn, to Anti-Apartheid Movement in the FRG, 4.10.1974
22. Reply of the Federal Government, Bonn, to parliamentary enquiry of Mr.Müller, MP, 14.3.1975
23. Reply Ministry of Foreign Affairs, Bonn, to Anti-Apartheid Movement in the FRG, 17.4.1975
24. Letter GfK, Karlsruhe, FRG, to Anti-Apartheid Movement in the FRG, 29.7.1975 in reply to the letter's questions of 17.7.1975
25. "The World Today", U.K.XXVI (10), 1970, p 426
26. "Rapport", South Africa 20.4.1975
27. Viertes Atomprogramm der Bundesrepublik Deutschland für die Jahre 1973-1976 (Fourth Nuclear Programme of

Bonn's capital share and influence in the nuclear cooperation with SA



the FRG for the years 1973-76), Federal Ministry of Research and Technology, Bonn, 1974, p 16

28. "New Scientist", U.K., 4/5, 1974
29. Fourth Nuclear Programme of the FRG (see Footnote 27), p 51
30. Yearbook of Nuclear Affairs, Düsseldorf, FRG, XVI, 8-9, 1971
31. Wall Street Journal, USA, 23.10.1970
32. "Süddeutsche Zeitung", Munich, FRG, 7.5.1971
33. "Debates", RSA, 24.5.1973
34. "Frankfurter Allgemeine Zeitung", 19.4.1975
35. "The Star", 8.6.1974
36. "The Star", 12.4.1975
37. "Der Spiegel", FRG, 28.7.1975
38. BBC 23.8.1975
39. "New York News", 28.2.1965

40. "South African Digest", 13.8.1965

41. "Sunday Express", S.A., 22 December 1968
42. "Die Volksblad", S.A., 6 May, 1969
43. "Die Beeld", Pretoria, 26 July, 1969
44. Nuclear Active, Atomic Energy Board, S.A., July 71, p 4
45. "The Times", U.K., 12.7.1974
46. "Kölner Stadt-Anzeiger", FRG, 14.6.75
47. "Süddeutsche Zeitung", FRG, 29.6.1975
48. Dr. Körting of GFK, Karlsruhe, responsible for public relations in respect to the jet-nozzle system, offered this information during an enquiry by telephone made by the Anti-Apartheid Movement in the FRG on 15.7.75. When more specific questions were asked, he corrected himself: "This is not to be quoted."

49. Dr. Gruber, Federal Ministry of Research and Technology, Bonn, during an enquiry by telephone made by the Anti-Apartheid Movement in the FRG on June 26th, 1975
50. Reply of the Federal Government, Bonn, to the enquiry in parliament by Dr. Uwe Holtz, MP/SPD, 21.2.1974
51. "Paratus", RSA (official organ for the South African army), June 1971, p 29
52. "Africa", U.K., No.44, April 1975
53. "The Guardian" U.K. 10.6.1975
54. "Financial Times", U.K., 28.6.1975
55. "Frankfurter Allgemeine Zeitung" 6.6.75
56. "Handelsblatt", (trade news), FRG, 3.6.1975
57. Deutscher Bundestag, 7. Wahlperiode, Drucksachen 7/3706, Fragen A94 und 95

Chronological Order of Events

| | | | |
|--------|--|----------------|---|
| 1956 | FRG: Foundation of the Society for Nuclear Research (GFK) in Karlsruhe | | |
| 1957 | SA: Establishment the Atomic Energy Board (AEB) as a separate body | 21.Aug. | FRG: Federal elections in the FRG: The Christian Democratic Party (CDU)/Christian Social Party (CSU in Bavaria only) suffers a defeat and the Social Democratic Party (SPD) in coalition with the Free Democratic Party (FDP) comes into power |
| 1957 | SA: Dr. Roux of AEB undertakes a six-month information tour abroad | | |
| 1959 | De Gaulle refuses West German participation on French nuclear weapons project as asked by Franz Josef Strauss | 10./11. | SA/FRG: Dr. W.L. Grant, director general of AEB and head of the enrichment project, who worked on the jet-nozzle method, visits the Nuclear Research Centre (KFZ/GFK) in Karlsruhe |
| | FRG: The Institute for Nuclear Processing Techniques (Institut für Kernverfahrenstechnik) of the GFK, Karlsruhe, commences development of the jet-nozzle system | Nov. | |
| 1960 | SA: Dr. Roux of AEB requests his heads of department to submit proposals for economic ways to enrich uranium. One of the departmental heads, Dr. Grant, proposed the new processing system. | 1970 | Federal Minister of Foreign Affairs and Vice-Chancellor Walter Scheel visits South Africa. |
| 1961 | SA: Commencement of the development of the enrichment technique through Dr. Grant of the initiative of Dr. Roux without the knowledge of AEB officials. | End of January | FRG: The then Federal Minister of Education and Science, Prof. Leussink, discusses with Sole the possibility of South Africa's participation in the gas centrifuge enrichment project under negotiation between the FRG, Great Britain and the Netherlands. |
| 1965 | SA: When inaugurating South Africa's first nuclear reactor, the Pretoria's Prime Minister Verwoerd said: "South Africa is one of the most important uranium producing countries in the world. It is the duty of South Africa not only to consider the military use of the material but also to do all in its power to direct its use to peaceful purposes". | March | FRG: Agreement concluded between the Society for Nuclear Research (GFK), Karlsruhe, and the fuel-energy concern STEAG, Essen, for the development of a jet-nozzle demonstration plant. |
| August | | | SA/FRG: Mr. P.I. Wilmot of AEB commences special training at the Nuclear Research Centre (KFZ/GFK) in Karlsruhe. |
| 1965 | SA: Nuclear reactor „Safari I" in Pelindaba starts operating (see item above), constructed by the companies Krupp (FRG), BBC (FRG), Allis-Chalmers (USA). | July | Installation of a prototype of a small separation stage in Karlsruhe. |
| 1966 | FRG: the politician Franz-Josef Strauss visits South Africa. | 20.July | SA: Vorster announces to Parliament in Cape Town the successful 'discovery' "by South African scientists of a new process for the enrichment of uranium and the techniques required for implementation". |
| 1967 | SA: Coming into force of the Atomic Energy Act, Act No. 90/1967, incorporating, inter alia, a long list of prohibited information, e.g. „in regard to reserves of ores containing any source material or the annual output of such material or ores by any person... or the price paid to any person in respect of such materials or ores.. or relating to prospecting for treatment or ores..." | 20.July | SA: Pretoria's Minister of Mines, Dr. de Wet, states at a press conference in Cape Town: "Almost a remarkable as the new process developed by the Atomic Energy Board is the fact that the Board succeeded in keeping the secret with such success that no information whatever in regard to it managed to leak out". And Dr. de Wet's concluding words of warning were reported to be: "It is perhaps fitting that, in the interests of South Africa and especially the communications media, attention is drawn to the strict stipulations of the Atomic Energy Act regarding the question of secrecy". |
| 1968 | SA: A three-men committee under the chairmanship of Dr. van Eck of the Industrial Development Corporation of South Africa studies possibilities for the realization of uranium enrichment and recommends the financing of a pilot plant. | July | SA: Foundation of the state-owned Uranium Enrichment Corporation (UCOR) with a capital of 50 million Rand. |
| 1969 | SA/FRG: Pretoria appoints D.B. Sole as new ambassador to the FRG. Sole served as the regime's representative on the S.A. Atomic Energy Board, held the position of chairman of the International Atomic Energy Organization in Vienna in 1959 and 1960 and continued to be a member of the Organization's Council of Governors until the end of 1972. | 23.Nov. | Report in the Wall Street Journal, USA, that in addition to other scientists from the FRG Prof. E.W. Becker of the GFK Karlsruhe is currently working in South Africa. |
| dto. | SA/FRG: Dr. H.J. du T. van der Linde, Dr. W.E. Stumpf and R.J. Schmitt of AEB com- | 1971 | Ex-Minister of Defence and Foreign Affairs, Dr. G. Schröder, and Secretary of State in the |

- Ministry of Economic Affairs, Philipp Rosenthal, in South Africa
- 1.April SA: Commencement of operations of UCOR.
- 12.April SA: Dr.Roux states that the new uranium enrichment process puts South Africa in a position to make her own nuclear weapons. SA: Coming into force of the Atomic Energy Amendment Act, No. 73/1971, to protect the new uranium enrichment process.
- July SA/FRG: Mr. B.C. Winkler of AEB visits the Nuclear Research Centre (KFZ/GFK) in Karlsruhe.
- 13.Aug. SA: Vorster states that South Africa now possesses one of the three methods for uranium enrichment.
- 13.Dec. FRG: Ambassador Sole enquires from Dr. Lindacker of the Technical Supervision Association (TUV) of the state of Rheinland about possibilities of safety control for nuclear installations supplied by German firms.
- 29.Dec. Haunschild writes a letter to Roux concerning visit in Pelindaba for discussion on nuclear co-operation.
- 1972 SA/FRG: Secret visit in Bonn by Pretoria's Minister of Finance, Dr. Diederichs, Vorster's personal advisor, Mr. P. S. Rautenbach, and Minister of Economy, Mr. S. L. Muller. Ex-Minister Schröder again in South Africa.
- 18./19. April FRG/SA: Secretary of State, Mr. Haunschild, Dr. D.Frenzel, Dr. M. Nettesheimer, Dr. R. Gerold, all officials in the Federal Ministry of Education and Science, Bonn, visit Pelindaba in South Africa.
- 12.July Confidential expertise sent by Haunschild to Roux. SA: Construction of the pilot enrichment plant in Pelindaba underway.
- 1973 SA/FRG: Secret visit to the FRG by Pretoria's Minister of Foreign Affairs, Dr. Muller, Minister of Finance, Dr. Diederichs, Secretary of State of the Ministry of Finance, Mr.G.W.Brown and Minister of Economic Affairs, Mr.Horwood. Ex-Minister of Science, Dr. G.Stoltenberg, Ex-Minister of Defence and Vice-President of the "Bundestag", Kai-Uwe von Hassel, Minister of Economy of the state of Nordrhein-Westfalen, Dr.Riemer, and the president of RWE, Prof. Mandel, visit Pelindaba.
- 11.-13. January FRG/SA: Dr. Bund, Chairman of the STEAG-company, pays another visit to Pelindaba, S.A., for discussions with Dr. Roux.
- 12.March SA/FRG: Dr. Roux of AEB visits Secretary of State, Mr. Haunschild, in Bonn
- 13.-15.March Dr.Roux of AEB visits STEAG; Essen
- 13.-14. March Mr. Krüger of AEB visits the Nuclear Research Centre in Karlsruhe
- 16.March Dr. Roux of AEB in Munich
- 29.March Mr. E. Maunders of AEB visits the Nuclear Research Centre in Karlsruhe.
- April/May FRG/SA: Prof. Boettcher of the Nuclear Research Station in Jülich, FRG, on behalf of Ambassador Sole invites scientists in Jülich and in Karlsruhe to apply for assignments at Pelindaba research centre.
- 1.May FRG/SA: Dr. H. Voelcker and Mr. H.Geppert of STEAG visit Pelindaba
- 24.May SA: The Minister of Mines, Dr.P.J. Koornhof, informs parliament that as a next stage to the pilot enrichment plant currently underway funds for a full-scale prototype plant were being made available. The full-scale plant will be able to process about 12.000 metric tons of uranium annually and will cost approximately \$ 700m. The power consumption will be about 2000 megawatts, which is about 23 % of the total present (1973) power generating capacity of ESCOM. The production of enriched uranium in South Africa would be approximately 30 % cheaper than any other process of similar volume in the world.
- 27.May Ex-Minister of Finance, Alex Möller, in S.A.
- 3.June
- 13.June FRG/SA: Cable by STEAG, Essen, to Dr.Roux, AEB: Agreement by STEAG, Secretary of State Haunschild, GFK Karlsruhe, in respect to memorandum on co-operation (p 14/15)
- 11.July SA/FRG: Dr. G.B. Lovell of AEB visits the Nuclear Research Centre (KFZ/GFK), Karlsruhe.
- August FRG: The cabinet of the Federal Government decides to recommend the STEAG company not to apply for government export credits or guarantees under the Hermes scheme in respect to the uranium enrichment project in South Africa.
- dto. FRG/SA: The politician Franz Josef Strauss visits South Africa.
23. Aug. FRG/SA: The STEAG company negotiates with SA to establish a commission to test the economic feasibility of the new enrichment process.
- 11.Sep. SA/FRG: Newby Fraser, director of external relations of AEB, visits the Federal Ministry of Research and Technology in Bonn.
- 11./12. Sep. SA/FRG: Dr. Roux visits Dr. Bund in Essen
- 13./14. Sep. Dr. Roux in Munich
- 18.Sep. FRG: Ambassador Sole meets Dr. Bund of STEAG

- 27.Sep. FRG: Inter-ministerial meeting of Secretaries of State of the Federal Ministries of Education and Sciences, Economic Affairs, Foreign Office of the Chancellor, giving unanimous support to the co-operation of STEAG and UCOR and the use of the technology of GFK in Karlsruhe.
- late 1973 FRG/SA: Four scientists of the Nuclear Research Centre (KFZ/GFK) Karlsruhe are reported to work at Pelindaba/Valindaba, S.A.
- 16.Nov. SA/FRG: Mr. B.G.L. Meyer of the AEB visits the Nuclear Research Centre (KFZ/GFK), Karlsruhe.
- 5.Nov. SA/FRG: Dr. Joubert of the AEB visits the Nuclear Research Centre in Karlsruhe.
- 1974 Minister of Finance Dr. Diederichs, Secretary of State of Economy F. Steyn in West Germany.
Installation of a big seperative stage in Karlsruhe.
- 4.Jan. FRG: Advertisement in "Die Welt", FRG: The S.A. Atomic Energy Board invites applications from nuclear scientists.
- Jan. FRG: The same advertisement appears in "Atomwirtschaft" (nuclear affairs), Düsseldorf.
- 26.Jan. S.A.: The pilot uranium enrichment plant is reported to have made progress.
- 9.Febr. FRG: Advertisement of 4.Jan. repeated in "Die Welt".
- 1.March FRG/SA: Prof. E.W.Becker of the GFK, Karlsruhe, who is the inventor of the jet-nozzle system, visits Pelindaba together with Dr. Schulte and Dr. Voelcker of STEAG.
- March FRG: Ambassador Sole meets the politician Franz Josef Strauss
- 19.March Treaty STEAG-UCOR
- 29.March Dr. von Kienlin, General Manager of the Uranengesellschaft in Rössing
- early April FRG: Dr. Roux of AEB, SA, visits the annual Industrial Fair in Hannover
- April Photos showing parts of the demonstration plant in Pelindaba indicate that a jet-nozzle plant is to be built (Nuclear Engineering International April 1974, p 225)
- 9.April FRG: The STEAG company announces conclusion of an agreement with UCOR, SA, to undertake a joint comparative feasibility study of the South African enrichment system and the jet-nozzle system.
- July USA: The scientific head of the Nuclear Energy Division of General Electric, Mr.K. P. Cohen, states that the "secret" uranium enrichment method of South Africa, on the basis of which the South African enrichment plant is to be constructed, represents in fact an adapted version of the jet-nozzle method developed by Prof. E.W.Becker of Karlsruhe, FRG.
- 12.July SA: The vice-chairman of AEB, Louw Alberts, declares that South Africa is able to produce the atomic bomb.
- 28.Aug. FRG/SA: Dr. Gerhard Stoltenberg (CDU), Prime Minister of Schleswig-Holstein and former Federal Minister of Science, visits Pelindaba, SA.
- 11.Sep. SA/FRG: The state-owned energy concern ESCOM of South Africa places an order with the MAN company, Nürnberg, FRG, for compressors worth \$ 184 million required for acceleration work at the enrichment plant. The compressors will be registered under the unified NATO codification system.
- 17.Oct. The head of the West German Luftwaffe, and German Military Representative to the Military Council of NATO in Brussels, Lieutenant-General Günther Rall inspects the enrichment laboratories in Pelindaba and discusses with Dr.Roux the progress of the project. Rall is guest of Pretoria's Department of Defence. He travels secretly, under a false name and with the approval of the West German Federal Minister of Defence, Georg Leber.
- 3.-5.Dec. SA/FRG: Dr. Meyer of AEB visits the Nuclear Research Centre (KFZ/GFK), Karlsruhe.
- 9.Dec. FRG: Dr. J. Rembser of the Federal Ministry of Research and Technology, Bonn, visits Ambassador Sole to discuss the STEAG project.
- 1975 SA/FRG: The South African Minister of Finance, Dr. Diederichs, visits the FRG.
- 24.-28. Febr. SA/FRG: Dr. Grant and Dr. Roux of AEB visit STEAG, Essen.
- 25.Febr. SA/FRG: Dr. Roux of AEB visits the Secretary of State in the Federal Ministry of Economic Affairs, Dr. C.D. Rohwedder.
- 5.March FRG: Ambassador Sole and Secretary of State Haunschild discuss the project.
- 14.March FRG: In response to a question by Mr.Müller, MP (SPD) to the Federal Government on STEAG's involvement in South Africa, the Federal Government states that the "two processes have not yet reached the stage to go in for production".
- 25.-28. March Dr. Roux visits STEAG, Essen.
- 7.April SA: Dr. Grant of AEB refers to the "STEAG feasibility study" as being "very successful". Construction of the prototype enrichment plant would begin in 1976. ("Financial Gazette", SA, April 4, 1975)

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7. April SA: Vorster announces that the pilot uranium enrichment plant near Valindaba has been successfully brought into operation. (*Allgemeine Zeitung*, Windhoek, April 8, 1975)
15. April FRG: The Federal Minister of Economic Affairs Dr. H. Friderichs, meets Pretoria's Minister of Mines, Dr. Koornhof, at the Industrial Fair in Hannover and discusses with him matters of co-operation in regard to nuclear affairs. (*Süddeutsche Zeitung*, FRG, April 21/22, 1975)
- 17.-27. April FRG/SA: Secretary of State of the Federal Ministry of Economic Affairs, Rohwedder, visits South Africa. On the 17. and 18. he meets Dr. de Villiers, vice-president of AEB and Dr. Loubser, vice-chairman of UCOR. On the 22. visit to Pelindaba. On the 24. discussions with Minister Koornhof in Pretoria.
17. April SA/FRG: The Pretoria's Minister of Mines, Koornhof, meets Secretary of State of the Federal Ministry of Research and Technology in Bonn, and obtains the repeated assurance that the Federal Government supports STEAG's involvement in South Africa.
17. April FRG: The Federal Government announced that South Africa will use its own method for the enrichment of uranium and not the jet-nozzle system.
18. April SA/FRG: Minister Koornhof meets Dr. Bund of the Ruhrkohle/STEAG companies at Hugenpoet Castle near Kettwig/Ruhrarea, where further steps of cooperation are being discussed. As a public relations exercise, the Ruhrkohle Company intends to arrange a visit of 20 German journalists to South Africa in the month of September 1975.
22. April SA: At the European Nuclear Conference in Paris, Dr. Roux and Dr. Grant of the AEB disclose for the first time some details about the enrichment method to be used in South Africa.
24. April During the debate on energy of the Federal Parliament, the economics expert of the Free Democratic faction in Parliament, Count Lambsdorff, who visited S.A. in February 1975 at the expense of the South African Government, recommended to parliament the participation of the FRG in the uranium enrichment project in South Africa. (Shorthand report on the Federal Parliament, 7th period of legislation, 167th session).
2. May FRG: The Scientific Counsellor of Pretoria's Bonn Embassy, Dr. Hellwig, visits the Institute of Space Technology and Aerodynamics in Göttingen, FRG, and discusses with the expert for electro-forming, Mr. Rammzweig, technical aspects of the jet-nozzle system.
15. May FRG: The newspaper "Handelsblatt" (trade news) reports that the study on the South African uranium enrichment method brought positive results.
22. June Thirteen advertisements in "Sunday Times", Johannesburg, requiring experts for Rössing, Pelindaba, Valindaba.
31. July FRG/SA: The politician Franz-Josef Strauss meets the Pretoria's Minister of Defence, Mr. Botha, in Pretoria.
1. Aug. SA/FRG: Dr. Loubser, UCOR, visits Messrs. Internationale Nickel Deutschland, Düsseldorf, to negotiate an agreement on electro-forming of the jet-nozzle equipment.
2. - 9. Aug. FRG/SA: Franz-Josef Strauss meets Minister Koornhof at a Farm owned by the Pretoria Regime.
29. Aug. Prof. Rautenbach and Dr. Kritzing from AEB visit Company Leybold-Heraeus, Hanau, for the supply of parts for the STEAG-UCOR-plant.
- 3.-24. Sep. Foreign Minister Dr. H. Müller in the FRG
11. Sept. Dinner for Müller attended by Haunschild, Schröder, General Lemm (Head of the Heeresamt), Lichtenberg, (Chairman of Commerzbank), Hansen, (Chairman of Bayer AG), Rohwedder.

List of Names and Abbreviations

- AA** *Auswärtiges Amt (Federal Ministry of Foreign Affairs, Bonn)*
- AEB** *Atomic Energy Board of South Africa*
- Alberts, Dr. Louw** *Vice-President of AEB, SA*
- Becker** *Director of the Institute of Nuclear Processing Techniques (Institut für Kernverfahrenstechnik) of the Nuclear Research Centre (Kernforschungszentrum), Karlsruhe, i.e. sub-units of the Society for Nuclear Research (Gesellschaft für Kernforschung - GFK) Karlsruhe, FRG.*
- BMBW** *The former Bundesministerium für Bildung und Wissenschaft (Federal Ministry of Education and Science), Bonn, with the ministers Lenz, Stoltenberg, Leussink since it came into being. The portfolio of the ministry comprised also the responsibilities of the formerly existing Federal Ministry of Nuclear Affairs (minister: Franz Josef Strauss).*
- In 1973, the complex of Research and Technology was removed from the portfolio and a separate Ministry established.*
- BMFT** *Bundesministerium für Forschung und Technologie (Federal Ministry of Research and Technology) Bonn, created in 1973.*
- BMWi** *Bundesministerium für Wirtschaft (Federal Ministry of Economic Affairs).*
- BMZ** *Bundesministerium für wirtschaftliche Zusammenarbeit (Federal Ministry of Economic Co-operation), Bonn*
- Bund, Dr. Karlheinz** *Chairman of the Executive Committee (Vorstand) of the Ruhrkohle AG, the mother company of*

- STEAG; Chairman of the Board of Directors (Aufsichtsrat) of the STEAG company Essen, FRG, and until 1973 also Chairman of STEAG's Executive Committee (Vorstand).**
- ESCOM** Electricity Supply Commission, the state-owned energy company in SA.
- Geppert, Hugo** Chief technician of the STEAG company with responsibility for the STEAG-UCOR project
- GfK** Gesellschaft für Kernforschung (Society for Nuclear Research), Karlsruhe, FRG. 90 % of the Society's shares are held by the Federal Government, 10 % by the Government of the State of Baden-Württemberg (Stuttgart). A sub-unit of the GfK is the Nuclear Research Centre (KFZ) with its Institute for Nuclear Processing Techniques.
- Grant, Dr. Walter L.** Director-general of UCOR and deputy director of AEB, South Africa.
- Haunschild** Secretary of State of the Federal Ministry of Research and Technology, Bonn
- IFK** Institut für Kernverfahrenstechnik (Institute of Nuclear Processing Techniques), a sub-unit of KFZ/GfK, Karlsruhe, FRG.
- KFZ** Kernforschungszentrum (Nuclear Research Centre), a sub-unit of GfK Karlsruhe, FRG
- Koornhof** Dr. Pieter Gerhardus Jakobus, Pretoria's Minister of Mines, Immigration, Sports and Recreation. The portfolio includes the nuclear field.
- KWU** Kraftwerksunion AG, Frankfurt, FRG, a company founded for the construction of power-generating stations by Siemens and AEG-Telefunken, both FRG, which each hold 30 % of the shares.
- Loubser, Dr. R.S.** Vice-President of UCOR, S.A.
- Newby, Fraser, A.** Director of External Relations, AEB
- Pelindaba** Nuclear Research Centre in South Africa
- Rohwedder, Dr. Carsten Detlev** Secretary of State of the Federal Ministry of Economic Affairs, Bonn
- Roux** Dr. Abraham Johannes Andries, President of AEB and UCOR.
- Ruhrkohle AG** Coal mining concern which operates 80 % of the coal mining in the FRG. The state-owned companies VEBA and Salzgitter AG hold together 40 % of the shares, therefore the Federal Government participates with 40 % in the Ruhrkohle AG. The subsidies received by Ruhrkohle AG from the Federal Government since 1971 amount to S 1500m. Ruhrkohle AG is the mother company of STEAG.
- Safari 1 and 2** Nuclear research reactors at Pelindaba, SA, in operation since 1965 and 1968 respectively. The reactors use 90 %-enriched uranium supplied by the USA.
- Schulte, Dr. Heinz** Chairman of the Executive Committee (Vorstand), of STEAG, Essen, since 1973
- Sole, Donald Bell** Pretoria's ambassador in the Federal Republic of Germany since 1969. He served as the regime's representative on the Atomic Energy Board (AEB) of South Africa, held the position of chairman of the International Atomic Energy Organization in Vienna in 1959 and 1960 and continued to be a member of the Organization's Council of Governors until the end of 1972.
- STEAG** Steinkohlen-Elektrizitäts-AG, Essen, FRG, a daughter company of the Ruhrkohle AG (see diagram). A fuel-energy concern with a staff of 5.000. Business in 1973 amounted to S 500 million. In the sub-unit "Nuclear Energy" there are 35 staff, in the sub-unit "Construction and Implementation" about 30 staff, who work on the STEAG-UCOR project. STEAG holds 33 1/3% in the company "Urangesellschaft", Frankfurt.
- Strauss, Franz Josef** Chairman of the Christlich-Soziale Union - CSU (Christian Social Union), a political party that exists only in the state of Bavaria, FRG, and is a sister party to the Christlich-Demokratische Union (CDU). During the period of the CDU-CSU-government and the ensuing CDU/CSU, SPD coalition government in FRG until 1969, Mr. Strauss held the following offices:
1953-1956 Federal Minister without portfolio (special responsibilities);
1955-1956 Federal Minister of Nuclear Affairs
1956-1962 Federal Minister of Defence
1966-1969 Federal Minister of Finance
- UCOR** Uranium Enrichment Corporation, Valindaba, SA, founded in 1971 with special responsibility for the enrichment of uranium.
- Verwoerd, H.F.** Prime Minister of the Pretoria Regime until 1968
- Voelcker, Dr. H.** Director of STEAG, Essen, FRG. Head of the department of Nuclear Energy.
- Vorster, J.B.** Prime Minister of the Pretoria Regime since 1968
- de Wet** Pretoria's Minister of Mines until 1972. The portfolio includes nuclear affairs.

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A selection from the West German press on the conspiracy. A more comprehensive press digest in English may be obtained from Progress Dritte Welt, 53 Bonn, 1 Buschstr. 20, F.G.R. (Please, send 2,00 DM/ 1 Dollars with order).



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2-10-75

Camp-Fire in the Game-Park

How a Bundeswehrgeneral travelled incognito to South Africa to confer about questions relating to NATO and nuclear research with the South African government.

During the question-hour in the Bundestag on October 16th, 1975, the social-democratic representative Lenelotte von Bothmer inquired:

'Is it true that German officers in their capacity as military persons frequently tour South Africa, despite the fact that there are no plans to extend the range of NATO beyond the tropic of cancer?'

The answer came from the then Parliamentary Secretary of State and present Military Ombudsman Karl Wilhelm Berkhan:

'No official tours of Bundeswehr officers are known to the Federal Ministry of Defence ... No one in

his capacity as military person as you have called it, has travelled to South Africa.'

Was the Secretary of State not informed or didn't he say the truth?

Berkhan continued:

'Whoever travels to South Africa has to apply for an official journey. A like official journey is granted only at high places. I can tell you even today, that this permission will not be granted.'

While Secretary of State explained this before the Bundestag, Bundeswehrgeneral Günther Rall, 57, German Military Representative to the NATO Military Committee in Brussels, was on route just then from Durban (S.A.) to the South African capital of Pretoria aboard a plane of the South African Air Force. At the airport a highranking officer from the South African army expected the General.

'The permission from high places' for the three-week tour financed by the South African government existed also.

This can be inferred from documents which until now had remained secret.

Rall, then still Chief of the German Air Force, had been supposed to set out for this state visit already a year before, in November 1973.

The trip whose detailed

schedule had been worked out had to be cancelled for time reasons, 'despite the fact, that I have attained the permission from my minister' according to Rall's letter recalling the trip to the South African ambassador, Donald B. Sole. The South Africans had been looking forward since a long time to the visit of the influential and highly decorated WW II veteran.

1972 Ambassador Sole wrote:

'I should like to emphasize that Rall takes this trip - not only because of his position in the High Command of the Bundeswehr but also because he possibly might succeed his predecessor Steinhoff in the High Command of NATO in Brussels.

I believe that this deserves a particular effort.' The efforts payed off. In the summer of 1974 the South Africans could fix the program for the Rall-journey from October 5th - 25th 1974. A selection from the points of the program:

'Sunday, October 6th, 1974, 10:35, arrival on the Jan Smuth Airport received by Lieutenant General J. P. Verster, Chief of the Air Force and wife; accompanying officer and wife; aide-de-camp for General Rall ... Thursday, October 10th, 1974, evening toast meat in the gamepark ...

Monday, October 14th, 12:30 lunch with the Chief of the Navy and wife.'

A limousine with driver is 'at disposal, anytime'. The South African Air Force provides helicopters and planes to transport the guest and his wife across the Republic and the former imperial colony 'German South West'. Diplomatic cables wirelessly transmitted preparatory details during the summer of 1974 - up to the question from Pretoria: 'Can wife speak English'.

On August 6th, 1974 General Rall paid a visit to Ambassador Sole at his Cologne residence and asked his travel agent for particular discretion.

Sole afterwards to his Ministry of Defence:

'Rall would be grateful, if all efforts would be made that his visit will not receive the least public attention. To the outside he is on a private visit ... To the German Minister of Defence, Mr. Leber, it is clear however, that there could be serious repercussions in Germany and possibly in NATO if something would transpire.

We have talked about what to do if something transpires despite all preventive measures. We agreed that we would explain his visit to be a private visit to his old friend Kurt Dahlmann (Editor of 'Allgemeine Zeitung' in Windhoek, squadron companion from WW II, decorated Ed.) and that the South African Forces which had heard of this by chance had offered some convenience, which he could not have rejected

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for reasons of politeness.' The preventive measures were: 'The South African Embassy booked and paid for the flight of General Rall and his wife Hertha on the name 'Mr. and Mrs. Ball.' During the stop in London the couple was taken care of by the Military Attache who had been ordered to wear civilian clothes just like the reception committee in Johannesburg, lead by the Chief of the South African Air Force. Prior to the journey mail from Sole was delivered via personel of the Brussels embassy. Because as Sole put down his fears: 'If we let this run through the regular NATO-Channels, it might get into wrong hands.'

Reason for the total screening lay not only with the necessity to hide military contacts with the Apartheid-Regime. Nos 53 to 56 of the travel schedule for October 17 th -one day after the Berkhan explanations - disclose: '11:00 Visitors drive to Atomic Energy Board, Pelindaba.

11:30 Conference with the President of the Atomic Energy Board ...

14:30 Visit of the laboratories.'

General Rall therefore took advantage of the occasion to inspect one of the most disputed South African ventures. With the cooperation from Essen 'Steinkohlen-Elektrizitäts-AG' (STEAG) and Ministry of Research and Technology controlled Karlsruhe Society for Nuclear Research

South Africa develops at Pelindaba a system for Uranium enrichment by which South African Uranium (20 % of world finds) is processed for fueling nuclear reactors.

However, Pelindaba enriched Uranium could be used not only for peaceful purposes.

Three months prior to the visit of NATO-General Rall the Vice Chairman of the South African Atomic Energy Board publicly declared in that his country -which has not signed the Non-Proliferation Treaty - is able to produce the atomic bomb, 'if this should be necessary.'

The South Africans were content with the result of Rall's visit. Ambassador Sole reports in November 1974 to the South African Joint Chief of Staff:

'Doubtlessly he (Rall) returned to Brussels as firm advocate of the necessity to recognize the strategic importance of South Africa (for NATO) ... Along these lines he has told a lot privately in NATO circles as well as in defence circles in Bonn. In Bonn however he meets with opposition from the ideological influence from the governing SPD' - which the Apartheid-ambassador terms 'German Socialist Party'.

Upon his return General Rall sent an autograph letter to Ambassador Sole, thanking him for 'the plenty of

experiences'. One thing the General wished to stress again:

'Deplorably enough a like visit is still delicate business because of our official position. Accordingly upon my return there has been some excitement in Parliament circles, when word got round that my visit allegedly had been on invitation of the South African government. The relevant question in Parliament has been strongly denied by my Secretary of State. I believe, in any case, we should stick to the agreement that I had accepted a private invitation as civilian and that naturally, for reasons of politeness, I had come into contact with official places of my vocation ...'

Ambassador Sole on his part took every opportunity to point to his merits in gaining the friendship of the NATO-General. In a 'personal and confidential' letter to the Permanent Representative of South Africa with the European Community he wrote:

'In reality he was guest of the South African Defence Forces ... I have taken care that his Minister gave his blessing to the trip, but this naturally should not be publicised, because some people might veto this if they knew anything.'

Now we will hear the participants:

Defence Ombudsman

Wilhelm Berkhan, when confronted by STERN last Thursday with the accusation, that he had dealt with the truth at least in a lighthearted manner, had his personal assistant deliver the message: he preferred not to talk about incidents which happened while he held the office of Secretary of Defence. South African Ambassador Sole even though available for STERN, stuck to the agreement: 'Private visit without any official character'.

The previously zealous travel agent now wants to 'have had nothing to do with the program': 'This is an inner-German affair'. To the question of how he had achieved Minister Leber's blessing for the trip, the ambassador quickly answered: 'This is not true', and then: 'I cannot recall this'.

Lieutenant General Rall even stuck to the agreement, when confronted by STERN quoting his own letters.

Rall: 'This has been a private trip'.

Upon the question, if he had written a letter to Ambassador Sole, cancelling the journey planned in 1973, 'despite the fact, that I have attained the permission of my Minister', Rall answered: 'This is not true. - STERN: 'Really?'

Rall: 'This is not true, this is not true. The Minister doesn't know anything'.

STERN is in possession of the Rall letter.

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DER SPIEGEL

6-10-75

a documentation under the title 'The Nuclear Conspiracy' accusing the West German Government of collaborating with the Apartheid-Regime in Pretoria at a military and nuclear level.

The ANC-representatives branded as hypocrisy statements by the FRG Foreign Minister Hans-Dietrich Genscher at the United Nations two weeks ago, that the West German Government condemned apartheid in South Africa. At the same time he was strengthening the regime through intensive nuclear and military cooperation, the ANC claimed. And indeed, the official coolness towards the government in Pretoria stands in curious contrast to the close contacts between West German scientists and military and their South African colleagues. Chief mediator in this network is the South African Ambassador in Bonn, Donald Bell Sole.

According to the documents published by the ANC, Sole transformed his embassy into a highly efficient centre for intelligence and contacts. Even before he came to Bonn early 1969 Sole got instructions from the South African Secret Service on 'principal contacts in Germany'. After a meeting with a certain Dr. Hugo on December 11th, 1968, Sole noted several names and contact addresses. Among other things, Pretoria had recommended that he contacts 'Finance Minister Dr. Stoltenbehr' meaning no doubt the then Science Minister and

present Prime Minister of Schleswig-Holstein, Gerhard Stoltenberg. The South African experts on Germany warned Sole of the electronic concerns AEG-Telefunken and Siemens, saying that the administration of these giant firms was overrun with American agents. But on his arrival in West Germany it didn't take Sole long to find out that, contrary to official West German statements, his countrymen were welcomed with open arms almost everywhere. From the West German Institute for Air and Space Travel, to the Nuclear Research Institute in Karlsruhe, or the armament and space travel concern Messerschmidt-Boelkow in Ottobrunn near Munich. But most of all the Bundeswehr stood to attention when their comrades from South Africa had any wish.

There can be no question that the West German military's activities are discussed and approved by its NATO-partners, mainly Britain and France, who have close contacts to the Forces of the South African Republic. NATO is interested in a military strong South Africa to secure the sea-route around the Cape. Each day 1.5 million tons of shipping passes Africa's southern tip. Despite the United Nations Arms Embargo Bonn is prepared to strengthen the defence power of the Cape Republic. With West German aid, the South African Navy installed the intelligence and control centre 'Project Advokaat' in Silvermine near Simons-

Avoid publicity

Since 1969 the South African Ambassador in Bonn has formed his Embassy into the most effective contact centre for military and nuclear interests

his country has. And West German authorities have helped willingly. Last week, a representative of the African National Congress (ANC) published

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town, which can control all ship and air movements in an area reaching from the Cape to North Africa, to the South American coast, the South Pole and India. The electronic equipment for the centre has been supplied by West Germany.

All spare parts were given NATO code numbers with the aid of the Bundeswehr material supply office. The embassy in Bonn hired three former Bundeswehr coding specialists and had them trained in the material supply office.

The Bonn soldiers also offer their friendly assistance when it comes to informing the military attache at the embassy, Brigadier General D. J. Hamman, on discussions within NATO institutions. On November 30th, 1972, Admiral Rolf Steinhaus from the planning staff of the Defence Ministry sent 'dear General Hamman' information on the 'expansion of NATO area in the South Atlantic.' When three South African officers asked for permission to inspect the computer centre in the Bonn Defence Ministry because South African Forces wanted to have a similar computer, they received permission after 12 days, according to file AB 02-25-25.

When the South Africans asked how the Bundeswehr copes with the problem of static of helicopters, the Air Force High Command volunteered to help: 'For the first time a device to eliminate electro-static loadings has been used

in the helicopter CH 53. The instrument is produced and supplied by Messrs. Dyna Sciences Corp.' The ministry also gave the address of the firm and offered a meeting with a Defence Ministry expert (file number 02-95-02 dated January 7th, 1974). Readily, the government-sponsored German Air and Space Research Centre opened its laboratories in Göttingen and Porz-Wahn to the South African military research expert M. E. Beyers from the Aeronautic Research Unit of the National Mechanical Research Institute in Pretoria.

And Beyers' boss C. G. van Niekerk, who has shown interest in helicopter rotor blades at Messerschmitt in Ottobrunn, precised them for answering all his questions without any reservations.

In case the military interest of the visitors becomes too obvious, the South African Embassy was informed of the decision of the Chief of Staff in Pretoria that Senior Research Officer Adolf G. Engelter be officially accompanied by the Embassy's scientific attache during his visit to West Germany, Italy and France, 'naturally with the consent and understanding of the military attaches.' Just as diligently as the emissaries from the Cape Republic provided their military forces at home with material from West Germany, they also saw to it that their nuclear scientists had access to West German know-how. Without any problems the Embassy was able to train

its nuclear scientists in the West German Society for Nuclear Research (GfK) between 1969 and 1974; again and again top experts of South African nuclear research visited West Germany. Ambassador Sole arranged at least five visits for the Chief of the South African Atomic Energy Board (AED), Abraham Johannes Roux, to West Germany since 1972. The goal of the visitors was always the same: apart from the Nuclear Research Centre (GfK) in Karlsruhe they visited the energy-concern STEAG in Essen. This is understandable, as STEAG and GfK are jointly developing the jet-nozzle system for Uranium enrichment, discovered by professor Erwin Becker from Karlsruhe.

For a long time the South Africans were docile pupils. In April of this year they introduced their own enrichment method, which is suspiciously similar to the discovery of professor Becker. The similarity is politically explosive. For a Uranium enrichment plant cannot only be used to provide fuel for electricity plants. It can also, though time-consuming and complicated processing, produce concentrated fission material for bombs. And it seems plausible that the South Africans, surrounded by hostile black Africans, would have an interest in the atom-bomb. 'Driven to despair, the regime will not hesitate to launch mass murder on the African continent', is the gloomy ANC forecast. Whether their suspicion is

justified, whether the West Germans are really helping the South Africans to achieve nuclear independence, cannot finally be proved. But it could have fatal consequences for West Germany even to be suspected of giving nuclear assistance to the racists in the Cape Republic. The Government steadily denies nuclear cooperation with South Africa: but GfK and STEAG, who have worked with South Africa for years, are under government control. 51 per Cent of the STEAG shares are held by Ruhrkohle AG, of which again 40 per Cent are in government hands; the GfK is 90 per Cent state-controlled.

At least unofficially, Bonn State Secretaries who appreciate South Africa as a Uranium supplier, do not hide their weakness for nuclear cooperation with the BOER-state. That is why Ambassador Sole got extremely positive impressions from a conversation with the State Secretary in the Ministry for Science and Research, Hans-Hilgar Haunschild. 'For the South African Government it is of great importance that the German government approves the activities of West German private industry', Sole wrote after a meeting with Haunschild on April 23rd, 1975. State Secretary Detlev Carsten Rohwedder used similarly clear language in a letter to the vice president of the AEB on May 5th, 1975: 'It would be nice if we could come to a long-term and fruitful cooperation in your area,

or in the peaceful use of nuclear energy as a whole.'

The diplomats on the Rhine always placed greatest value on discretion. Sole stamped all letters on nuclear energy 'classified', telegrams were always in code, and atom-related mail for West German firms was transported by messengers. The diplomat, well at home in the sensitive domestic political life of West Germany, did his best to conceal the nuclear business from the public. When GfK-professor Becker flew to South Africa in 1974, Ambassador Sole wired the Ministry in Pretoria to avoid publicity in the case of professor Becker. And after a discussion with Horst-Ludwig Riemer, Economics Minister of Northrhine-Westphalia, on the STEAG-engagement in South Africa, Sole wrote on May 7th, 1973, 'personally and secretly' to AEB-Chief Roux: 'In view of the current German domestic policy the talks must remain secret at this stage'.

Top-level discretion was also applied whenever the Ambassador himself and his staff acquired information on behalf of their nuclear scientists. On December 2nd, 1974, Sole instructed his Science Attache Dr. H.R. Hellwig, to look around for 'Galvano-plastic Techniques' in West German industry. Such techniques are needed for the construction of the so-called jet nozzle device the South Africans need for their enrichment plant. But, Sole said, the 'connections between Uranium-enrichment

and my request for galvano-plastic techniques should under no circumstance be revealed.' After months of research, Hellwig's efforts met success in April 1975 at the Institute for Space Travel and Aerodynamics in Goettingen. There he came across a scientist named Rammenzweig who, according to Hellwig's report to the Ambassador on May 2nd, 1975, seemed to be very experienced in galvano-plastic techniques. However, Rammenzweig himself immediately noticed what the South Africans wanted. According to Hellwig, he 'linked our interest in his knowledge to Uranium enrichment'.

So, even if the West German governments justly asserts there is no cooperation at government level, and that no export permit for nuclear technology has been given, South African nuclear scientists owe a lot to the understanding of West German industrialists, scientists and officials, and above all to their own diplomats.

But meanwhile Bonn is a bit uneasy about the activities of Ambassador Sole. Stirred by the manipulations of Sole in the case of West German Air Force General Rall, and by the activities of Sole-employees in the military and nuclear field, the Federal government urges personal consequences: it will be hinted to South African Foreign Minister Hilgard Muller that he recalls his Ambassador as quickly as possible.

The Leber Case

Merely a case of misunderstanding has been what South Africa's ambassador to Bonn claimed in four secret reports: Minister of De-

fence Leber had been informed about the South African trip of General Rall and had even approved the clandestine business. Despite Sole's retractions the background of the affair remains in the dark. A general was fired, an ambassador will have to go. The minister remains in office. October 1st this year Minister of Defence Georg Leber discharged the German NATO-General Günther Rall. The officer has for three weeks toured South Africa by courtesy of the apartheid regime without, so says Leber's version, having informed his superior of the notorious trip.

Three weeks later the Pretoria government saw itself forced to recall her Bonn ambassador Donald

Bell Sole. It cannot back the diplomat any more after SPIEGEL had published last week a Sole letter to the Pretoria headquarters. In this letter dated April 4th, 1974, six months prior to the Rall tour, the ambassador reports, that he personally has spoken with Leber about Rall's plans for travelling. Leber last Friday to a confidant: 'This Sole has to leave'. Would the South Africans not cancel the assignment of their ambassador and had Sole himself not retracted in the meantime the critical passage from his letter during a consultation with Foreign Secretary of State Walter Gelhoff, Georg Leber hardly would have had another choice but to resign. Because over and over again the Bundeswehr boss had asserted not to have known of the Rall visit ('I have absolutely never been acquainted with this affair'.)

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Yet, had the ambassador - as his secret paper says - talked with Georg Leber about the dubious excursion, then the Minister had sacrificed his General to save himself. Even three weeks ago, after the supposed swift close of the Rall affair, there had remained doubts if Leber had really been as uninformed as he claimed to be. After all the Hamburg STERN had at that time published two documents according to which Leber knew about the business: On 14 June 1974 Sole wrote to the Permanent Representative of South Africa to the European Community in Brussels: 'I have taken care, that his (Rall's, ed.) Minister gave his blessing to the trip.' On 6 August 1974 the South African ambassador reported, this time to the Ministry of Defence in Pretoria, after a conversation with Rall concerning the prospective visit of the General:

To the outside he is on private visit ... it is clear to the German Minister of Defence however that there is more than this involved in the visit. Already on June 19th, 1973 the ambassador had written in a letter to the South African Lieutenant General H.P. Lonsber now in possession of SPIEGEL about a conversation with Rall dealing with the postponement of the journey which originally had been planned for 1973. It reads: 'He (Rall, ed.) informed me, that he had discussed the matter with his Minister Georg Leber, who had

agreed completely'.

Most unequivocally Sole names Leber as accessory in his letter dated 4 April 1974 (see photo). The ambassador to Hans van Dalsen, as Under-Secretary of State, third man in the South African Foreign Office:

'I was able to arrange that clearance for the visit be given on an informal basis by the German Minister of Defence, Georg Leber, to whom I also spoke about the matter.'

For more than a year then towards four different addresses, Ambassador Sole has maintained that the Bonn Minister of Defence had been in on the travel arrangements. And: particularly in the clearest of terms the ambassador communicated with a man he has friendly ties with: Sole and van Dalsen are old buddies. In the South African Foreign Office they are regarded as a team, as 'the two blue eyed boys'. The version officially spread in Bonn, that the ambassador as is common practise in his trade has boasted with good contacts to top politicians of his host country at his headquarters, does not provide sufficient explanation for the ambassador's conduct: why should Sole need to put airs in particular against an old friend by means of trumped up allegations?

A chain of incongruities: Has Sole in his letter dated 19 June 1973 also reported knowingly false about a conversation with the Lieutenant General? Or has Rall intimated an untruth?

In short: Either the ambassador or the general has not kept the truth - maybe both. There is nothing, so it seems, Leber could be charged with.

Actually Leber could have granted a general's visit to Pretoria without feeling as accessory to South African racists. Because since a long time the Bundeswehr Chief of Staff has been pressed by the Americans to cultivate military cooperation with the apartheid state strategically well situated on the Southern tip of Africa.

Therefore the Minister for example had no objections that his officers maintained close contacts to the comrades from the Cape. Regularly the military attaches from the South African embassy hosted top people of the West German Armed Forces. Hardthöhe answers frankly to requests by the South Africans and Leber bureaucrats were ready to supply the South African Armed Forces with NATO code numbers when West German material was delivered (SPIEGEL 41/1975). Thus the South African Ambassador concluded that his country would always be met with appreciation by the social democratic Minister of Defence. In a letter to General Lonsber announcing that Rall could not get ready for his trip to the Boer Republic before 1974, he wrote:

'It is quite some time till then and naturally a lot can happen in the meantime. If he (Rall, ed.) had another minister who is less well disposed as Georg Leber, then he would be unable to obtain the permis-

sion for the visit of South Africa.'

The Minister of Defence also seemed useful to Ambassador Sole because Leber deems necessary the export of German arms which until now is prohibited by decree of the Federal cabinet. After a consultation with Economics Secretary of State Detlev Karsten Rohwedder Sole reported home on 2 May this year: Rohwedder who during the conversation had basically supported the delivery of arms to South Africa, would have 'Minister of Defence Leber on his side'.

All the more embarrassing must have been to the South African government that a man which it regards as its friend got into trouble through the Sole documents. During his visit of exculpation to the Bonn Foreign Office he affirmed the papers in possession of SPIEGEL to be genuine, though dissociated himself from the sentence incriminating Leber: 'At no time' so the Foreign Office could spread, he had 'talked about the visit of General Rall in South Africa' with the Minister.

But the South Africans did not like the denial to remain that clear cut. Their representation forwarded a forced explanation for the curious contradictions between Leber and Sole. The ambassador, so it said 'was under the impression, which later proved to be a misunderstanding, that the Minister was informed about the planned visit.'

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Nuclear Business — A Bomb for 1995

Behind the scenes state controlled companies negotiate closer cooperation in the field of nuclear energy with South Africa. Last Wednesday the Federal Cabinet deleted one sentence from a paper prepared by secretaries of state concerning an enquiry into cooperation between the Federal Republic and South Africa. From the three-page document 'entitled in an ugly Goebbels fashion' 'Sprachregelung' (according to Chancellor Helmut Schmidt) the paragraph reading: 'There is no cooperation between the Federal Republic of Germany with South Africa in the field of nuclear energy' was removed. On the contrary, the cleaned paper maintains only that it would be 'absurd' to insinuate that Bonn was 'helping this country to manufacture an atomic bomb.' Only the German company Steag (Essen) and the South African nuclear forge Ucor had 'reached an agreement in 1973' to undertake a comparative study on the feasibility of two different systems of uranium enrichment. Actually, this contract had only been signed in 1974. Moreover Chancellor Schmidt and his Ministers affirmed: —'In so far as economic sanctions have been im-

posed by the Security Council (of the UN) they are observed to the letter'; —'the Federal government uses its economic relations in support of its efforts to induce the South African government to revise its racial policy.' The South Africans, however, are more content with their trade relations than the cabinet affirmations would like to make believe. Relations between German nuclear scientists and industrialists and white Africans who want to buy German know-how in order to process their enormous deposits of natural uranium as combustible matter for reactors are quite old. Already in 1962 as Karlsruhe Professor Erwin Becker, inventor of the jet nozzle system for uranium enrichment, noted in a letter to the Federal government, the Head of the South African Atomic Energy Board, Abraham Roux, showed up at the Baden research center for the first time. Becker was under the 'impression' that his guest was interested 'only in the application' of the complicated technology, which German scientists till then had described only in theory. The transformation of the theory by now accessible to the general public into practice is even today, according

to the opinion of Steag boss Heinz Schulte 'incredibly difficult'. Only the present South African ambassador in Bonn, Donald Bell Sole, who at one time represented his country at the International Atomic Energy Organisation in Vienna, succeeded in making commercial use of the transnational shop-talking. Immediately upon moving into the ambassadorial residence, DBS —as he had himself called— embarked on breath-taking activities contacting industrial, scientific and also political circles. For example, embassy personnel observed the inventor Becker come and go at the mission. 19 June 1973, he wired to Pretoria that German companies had been instructed to transmit their 'confidential reports' e. g. to the South African Ministry of Defence through embassy channels, since for this purpose 'our code systems could be employed'. Bonn Secretaries of State, which he invited to his home country, were discovered by DBS and his friends to be subject to inclinations, which seem alien to the concerned by now. 'I think' he declared after consulting Economics Secretary of State Detlev Karsten Rohwedder on German arms exports, 'if Chancellor Schmidt would lend his ear to him (Rohwedder), that progress could be made.' The Pretorian nuclear researcher Roux, whom Sole introduced to Rohwedder's colleague from the Ministry for Research, Hans-

Hilger Haunschild, noted on January 21, 1972 only a short time before the official travelled to the Cape, that he shared Haunschild's 'feeling that the visit would be marked by a closer cooperation in the nuclear field.' This consequently happened. Sole introduced the Steag company —a subsidiary of state subsidized Ruhrkohle concern— which had acquired from nuclear researcher Becker the rights for commercial application of his system to Roux. On August 15, 1973 both parties signed a secret contract. Position 3 of this nuclear treaty said that the Germans ceded a 'sublicence' for Becker's enrichment system on the condition that Becker's institute, the state controlled Society for Nuclear Research in Karlsruhe (Board of Directors: Haunschild) would approve the arrangement. 'Contradictory to expectation' as Steag executive Helmut Völker thinks now, the development was suddenly obstructed. The Federal inspectors of the Karlsruhe Institute declined to bear full responsibility. So it happened that on September 27 a quartet of Secretaries of State met at the Bonn Economics Ministry to discuss the question —delicate in terms of foreign policy— and since the Foreign Office considering the black African states filed their discontent, the explosive matter was forwarded to the Federal Cabinet. Decisionmaking there was to be aided by a paper suggesting according to the me-

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memory of the then Minister of Research Horst Ehmke as salomoniacal 'Yeno'. During the subsequent cabinet meeting October 17, Minister of Development Erhard Eppler and Special Minister Werner Maihofer vetoed the project until Chancellor Brandt tired of the quarrelling postponed the decision for a week. One day after the government discussion Steag retracted by mail its request of approval. One week later Brandt declared that the matter had been settled.

As to the manner by which the matter had been so elegantly taken care of the concerned offer varying explanations.

Haunschild: 'Steag must have known every step the government took.'

Ehmke: 'We told the company to retract the request because it didn't have a chance.' Ehmke's Parliamentary Secretary of State Volker Hauff: 'They wanted to know if they could get away with it anyway.'

Only by a 'criminal act' says Ehmke today Steag could have exported the knowledge of enrichment with approval of the government. However there were evidently other, more complicated ways. Official Bonn investigators discovered a legal expertise at the Ministry of Research which attempts to prove that only the commercial application of German know-how, that is only with the beginning of construction of a South African enrichment plant 'needed approval', and preliminaries needed no permission.

Also the German Law of

Foreign Trade was not 'affected'. Steag with reference to the Economics Ministry wired to South African nuclear negotiator Roux. The Non-Proliferation Treaty finally which prohibits the passing on of such knowledge and the export of relevant materials without international control, is in effect for Bonn only since May 2, 1975.

Consequently Steag and her partners for a start agreed on a 'Joint study' - reputedly hoping to find out about a South African enrichment system of which Roux and his supporters suddenly began to speak, even though only six months ago they still had wanted to buy the licence of the Steag system.

When Steag and South Africa had signed a second contract, the aim was defined in the following way:

'Provided the comparative analysis shows 'positive results' the construction of a commercial enrichment plant in South Africa on an international basis should be envisaged.'

One year later, May 14, 1975 the conclusion was reached - and proved - as was expected - 'positive' (Steag). Now the conditions for partnership are investigated. Because: 'We are morally entitled' assures Steag chairman Schulte.

His company has secured from the South Africans the rights to obtain 1000 tons of enriched uranium per year once the plant is ready.

Schulte: 'The outlet of the product has to be ensured.'

Anyway he would take 'no step without attuning Bonn'.

With that kind of precision, however, the Bonn officials evidently don't want to be informed about the steps of their nuclear energy experts. The Frankfurt based 'Urangesellschaft' for example, in which the government indirectly has a share and which obtains 80 % of the costs for worldwide prospecting from Bonn, had after the endorsement of sanctions by the Security Council and an intervention by the Brandt government to retract an agreement, which secured 40 % of the shares of the uranium mine Roessing in the territory of Namibia (formerly German South West) contested by both the UN and South Africa to the company. The uranium company, however, for which South Africa still holds an option for capital investment in Roessing, according to latest investigation, the cabinet learned to its surprise still obtains 'a considerable portion' of its imported uranium from the contested Namibian mine - via a ten-year agreement with the London-based Rio Tinto Zinc.

Memoranda of ambassador Sole which came to light recently, according to which the uranium company in addition secretly has put investment capital into the mine prompted Bonn government officials to ask for an investigation to examine both facts and participation of the concerned public servants. Meanwhile South African

ambassador Sole is confident that the prospective cooperation of his countrymen with the Essen Steag will work out too in the foreseeable future, even though 'some obstacles within the government have to be overcome'.

In effect, the ambassador noted October 2, 1974, the Secretaries of State Haunschild and Rohwedder 'support' plans for a 'German-South African-Iranian cooperation in the field of nuclear energy' - plans whose existence Haunschild absolutely rejects, while Rohwedder at least remembers 'a few conversations'. At least Persians and South Africans have already reached an agreement. Last

week they signed a long term secret agreement. Iran helps South Africa finance the enrichment plant which is to be built with help from Steag by providing half of the costs of construction. In exchange the Persians obtain 14.000 tons of enriched uranium - 'sufficient to fuel 100 nuclear power stations for the remainder of the century' according to calculations of an American expert.

That South Africans according to the unanimous opinion of experts could process the combustible matter for military purposes even though the process is quite time consuming is a fact which does not bother its business partners - nor Steag. Steag boss Schulte last week: 'South Africa will have a bomb no sooner than 1995. Till then there will certainly be different political circumstances.'



137 heavy military trucks before shipping from Bremen to Durban in May 1975