

This is a summary of a clinical study in patients with ovarian cancer. It is written for the general reader and uses language that is easy to understand. It includes information about how researchers did the study and what the results were. The simplified title for the study is: 'A study of nintedanib with chemotherapy compared to placebo with chemotherapy in patients with advanced cancer of the ovaries, fallopian tubes, or the abdominal lining'.

We thank all patients who took part in this study. Through your participation, you helped researchers answer important questions about nintedanib and the treatment of cancer.

What was this study about?

The patients in this study had cancer of the ovaries, fallopian tubes, or the abdominal lining (peritoneum). The purpose of this study was to test whether adding a medicine called nintedanib to the standard treatment of chemotherapy could help patients live longer without further growth of their cancer. During the study, researchers also collected information on side effects.

This study started in December 2009 and finished in September 2016. The sponsor of this study was Boehringer Ingelheim.

Why was the study needed?

Ovarian cancer is difficult to treat because most patients already have advanced cancer when they are diagnosed. Also, removal of the tumour with surgery and then treatment with chemotherapy often does not fully cure these patients. Over time, the cancer comes back or starts to grow again. Then it is much more difficult to treat. Adding another type of medicine to the chemotherapy at the beginning of treatment can help. Researchers wanted to see whether giving nintedanib with chemotherapy could help patients live longer without further growth of their cancer.

Which medicines were studied?

Nintedanib (also known as BIBF 1120) is a medicine that helps to stop cancer from growing and spreading. Nintedanib blocks the development of new blood vessels in growing tumours. It is used to treat a certain type of lung cancer in combination with a type of chemotherapy called docetaxel. Nintedanib is taken as a capsule by mouth.

About two thirds of the patients in this study were treated with nintedanib and one third of the patients were treated with placebo. Placebo capsules looked like nintedanib capsules, but had no active medicine in them. Both nintedanib and placebo were given in addition to standard chemotherapy.

The chemotherapy in this study was a combination of 2 medicines, carboplatin and paclitaxel. These 2 medicines are used as standard treatment for patients with ovarian cancer. The chemotherapy was given by infusion into a vein. This means it is dripped into a vein through a plastic tube and needle.

Who participated in the study?

All patients were adult women with advanced ovarian cancer. Patients had undergone surgery to remove as much of the cancer as possible before the study started. Patients had received no other type of treatment for their cancer. To participate in the study, a patient was to have been suitable for treatment with carboplatin and paclitaxel chemotherapy.

Overall, 1366 patients took part in the study. The average age was 57 years. The youngest patient was 21 years old and the oldest patient was 84 years old.

The table below shows the number of patients in different geographical regions and countries who took part in the study.

Geographical Region	Countries	Number of Patients
Europe	Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Italy, Netherlands, Norway, Poland, Portugal, Russia, Slovakia, Spain, Sweden, Ukraine, United Kingdom	1139 patients
North America	Canada, United States	214 patients
Australia/New Zealand	Australia	13 patients

How was this study done?

A total of 902 patients were treated with nintedanib and 450 patients were treated with placebo. The treatment with nintedanib or placebo was given in addition to chemotherapy. It was decided by chance who got which treatment. Neither patients nor doctors knew whether the patients were taking nintedanib or placebo.

Patients in the nintedanib group started on a dose of 200 milligrams (mg) twice a day. This dose could be decreased if the patients had side effects that they could not tolerate.

Patients received 6 courses of chemotherapy. During this time, patients also took nintedanib or placebo. The chemotherapy infusions contained paclitaxel and carboplatin. The dose of paclitaxel and carboplatin depended on the size of the patient's body and how well their kidneys were functioning. After 6 courses of treatment, patients stopped receiving chemotherapy and continued either nintedanib or placebo for the rest of the study.

Some patients had to stop all treatment early because their cancer grew or because they had side effects that they could not tolerate.

All patients in the study followed the same procedures:

- Patients had to visit the doctor once to see whether they could take part in the study.
- Each chemotherapy treatment course took 3 weeks. Patients had to visit their doctor once per week during the first treatment course. During the second treatment course patients had to visit their doctor twice. After that, patients visited their doctor once during each treatment course.
- At each visit, the patients answered questions about their health.
- At some visits, the doctors measured the size of the tumours and checked if any new tumours had formed. Other assessments were also done to check the patient's health.
- At all visits, the doctors collected information on side effects.

The doctors looked after each patient and checked their test results. The doctors did more medical tests when needed.

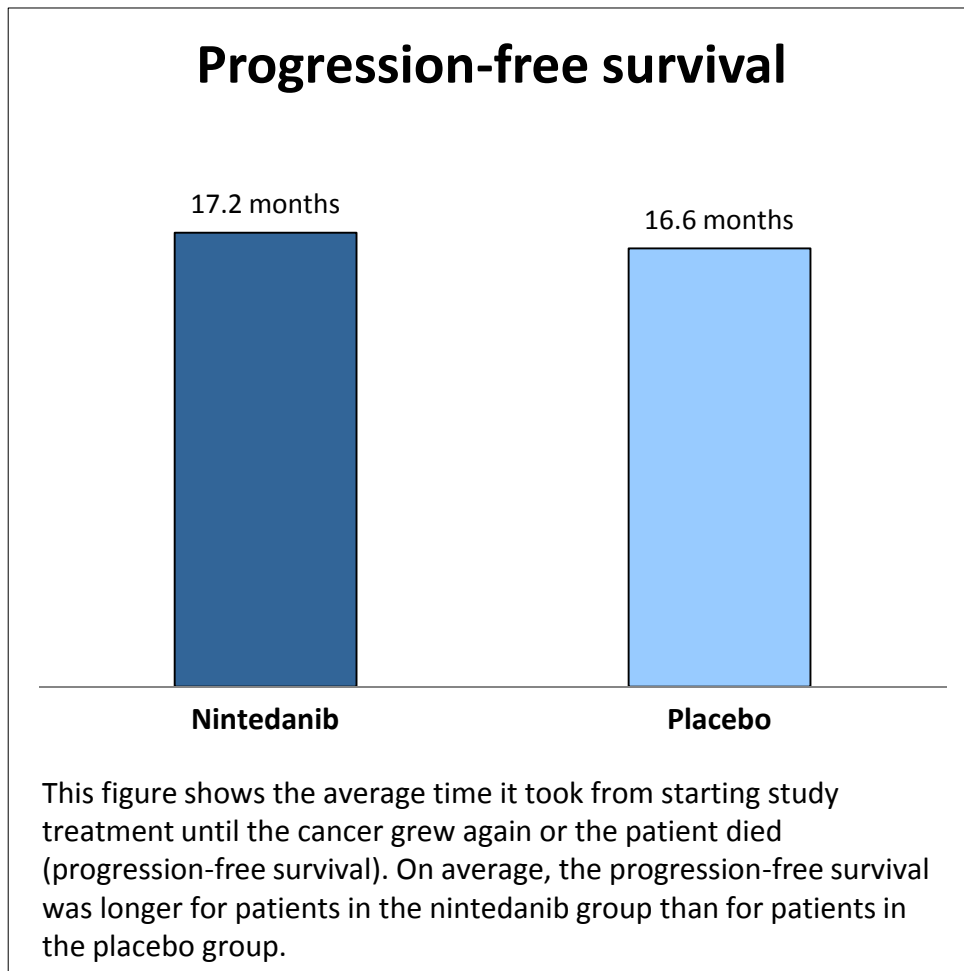
To see if nintedanib with chemotherapy could prevent the cancer from growing further, the researchers measured the time from starting study treatment until the cancer grew further or until the patient died. This time is called 'progression-free survival'. Researchers also measured the time from starting the medicines until the patients died from cancer or from any other cause. This is called 'overall survival'.

What were the results of this study?

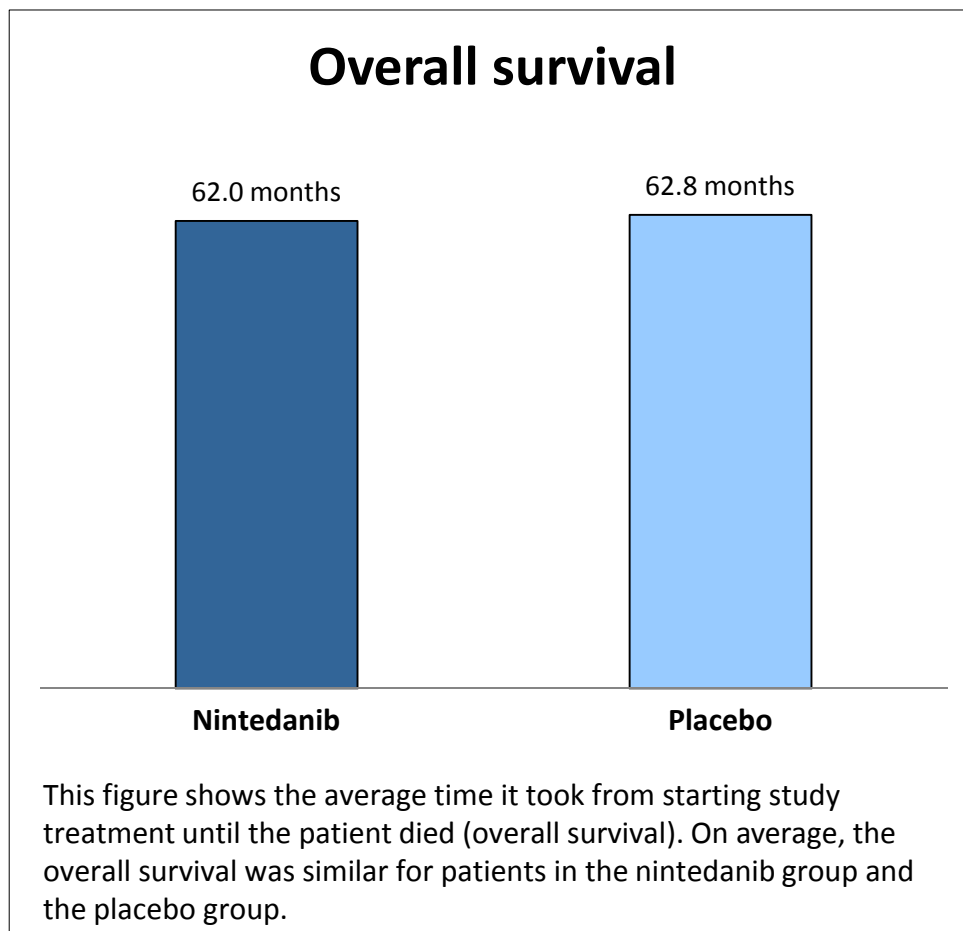
The main analysis for this study was done in 2013. At the time of this analysis, 53.3% of patients in the nintedanib group and 58.5% of patients in the placebo group had their cancer grow again or died. The chance of the cancer growing further or the patient dying at any time during the study was 16% lower for patients in the nintedanib group than for patients in the placebo group.

The average progression-free survival was longer (17.2 months) for patients in the nintedanib group than for patients in the placebo group (16.6 months). Results are shown in the figure on the next page.

Researchers used statistical tests on the results to confirm that the results were reliable. They found that the differences in progression-free survival between the nintedanib group and the placebo group were probably not due to chance. Once the study was completed, a final analysis showed similar results for progression-free survival.



Researchers found that there was no difference in overall survival between patients in the nintedanib group and patients in the placebo group. By the end of the study, 44.1% of patients in the nintedanib group and 44.6% of patients in the placebo group had died. The average time until patients died was 62.0 months for the nintedanib group and 62.8 months for the placebo group. Results are shown in the figure on the next page.



What side effects did patients have?

In this study, 752 out of 902 patients (83%) in the nintedanib group and 231 out of 450 patients (51%) in the placebo group had side effects.

The most common side effects seen in at least 10% of patients in either group are shown in the table on the next page.

Doctors keep track of all health problems patients have during a study. Some of these health problems might be caused by the study medicines, and some by other medicines taken by the patient. Others might be caused by the disease, and some have yet a different cause. Here we describe health problems that the doctors thought were caused by the study medicines. These health problems are called side effects.

	Nintedanib (902 patients)	Placebo (450 patients)
Patients with any side effect	752 patients (83%)	231 patients (51%)
Diarrhoea	528 patients (59%)	63 patients (14%)
Nausea	292 patients (32%)	76 patients (17%)
Vomiting	211 patients (23%)	34 patients (8%)
Increased level of a liver enzyme (alanine aminotransferase increased)	191 patients (21%)	23 patients (5%)
Increased level of a liver enzyme (aspartate aminotransferase increased)	155 patients (17%)	22 patients (5%)
Feeling tired (fatigue)	143 patients (16%)	62 patients (14%)
Reduced number of white blood cells (neutropenia)	90 patients (10%)	21 patients (5%)

Some patients in the study had serious side effects. A side effect was serious if it caused the patient to go to the hospital or stay longer in the hospital. It was also serious if it needed a doctor's immediate attention, was life-threatening, or caused death.

A total of 124 out of 902 patients (14%) in the nintedanib group and 34 out of 450 patients (8%) in the placebo group had a serious side effect.

A total of 30 patients out of 902 patients (3%) in the nintedanib group and 16 patients out of 450 patients (4%) in the placebo group died during treatment in the study. There were 3 patients (less than 1%) the nintedanib group and 1 patient (less than 1%) in the placebo group who died due to side effects that the doctor thought could have been caused by the study medicine.

Are there follow-up studies?

No follow-up studies are planned.

Where can I find more information?

You can find the scientific summaries of the study results at these websites:

www.trials.boehringer-ingelheim.com	search for the study number: 1199.15
www.clinicaltrialsregister.eu	search for the EudraCT number: 2008-006831-10
www.clinicaltrials.gov	search for the NCT number: NCT 01015118

The full title of the study is:

‘Multicentre, randomised, double-blind Phase III trial to investigate the efficacy and safety of BIBF 1120 in combination with carboplatin and paclitaxel compared to placebo plus carboplatin and paclitaxel in patients with advanced ovarian cancer’.

Important notice

This summary shows only the results from one study and may not represent all of the knowledge about the medicine studied. Usually, more than one study is done to find out how well a medicine works and the side effects of the medicine. Other studies may have different results.

You should consult the prescribing information for your country to get more information on the medicine studied, or ask your physician about the medicine. You should not change your therapy based on the results of this study without first talking to your physician. Always consult your physician about your specific therapy.

Boehringer Ingelheim has provided this lay summary in accordance with transparency obligations. This lay summary is intended for audiences located within the European Union.

©Boehringer Ingelheim International GmbH.
