Bovine neonatal pancytopenia (BNP) is the consensus name for a bleeding and pancytopenic syndrome in neonatal calves which emerged in 2008 all over Europe. In Belgium, epidemiological data on BNP were collected by telephone enquiry and/or farm visit. Farms were selected if bone marrow hypoplasia and/or pancytopenia in peripheral blood could be confirmed in a BVD PCR negative calf, younger than 1 month old. Between June 2008 and September 2009, 30 out of 35 reported herds met this criterion. A total of 84 affected calves with similar symptoms, could be retrospectively identified. Three herds had already cases in 2007, and two other herds reported their first case in 2006. The breed distribution was 50% Holstein-Friesian, 43% Belgian Blue and 7% crossbreed. The incidence of affected herds was higher in Western (0.2%) and Eastern Flanders (0.2%) than in Antwerp (0.05%) and Limburg (0.04%). The incidence of newly affected herds was higher in summer and fall. The total number of affected calves per farm between 1 and 9. In 63% of the herds more than one calf was affected in one year, and these cases were almost always clustered (1-6 calves). In 6 out of 7 herds, from which blood samples of calves of the same age group as the clinical case were collected, leukopenia could be demonstrated in an asymptomatic calf, which remained healthy afterwards. Of the affected calves 40% was born from heifers, 30% from 2nd parity, 25% from 3th parity and 5% from 4th parity. In two herds the same cow gave birth to a case twice, not necessarily in consecutive years. On 47% of the farms only fresh colostrum from the mother was given, whereas on 30% fresh colostrum in combination with frozen colostrum from the own herd was used. Only three herds (10%) occasionally used frozen colostrum from another herd. In one herd fresh colostrum was supplemented with a colostrum replacer. Of the herds, 83% reported a history of bovine viral diarrhea (BVD) 1 to 10 years ago. Recent screening results demonstrated BVD circulation in 12 of the 20 examined herds. All but one herd were vaccinated against BVD virus. The one herd, which didn't vaccinate, was the farm that used colostrum replacers. Four BVD vaccines were used of which one had been used or was still used on all but one farm. On three farms the first cases of BNP were observed before BTV vaccination was performed on these farms. Between October 2009 and May 2010 another 19 affected herds in Northern Belgium were identified.